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EDITION





[29] Matched
Four piece center
V-matched ends



[30] Matched
Eight piece center
Ribbon stripe ends



The
MAHOGANY BOOK

By George N. Lamb

•
Eighth Edition
•

This book has been prepared for the architect, the designer, the maker of cabinetwork and furniture, and for those who sell and for those who buy. This new and improved edition presents Mahogany, the most romantic of all cabinet woods, in its present usefulness to the nation.

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MAHOGANY ASSOCIATION, INC.

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THE MAHOGANY INDUSTRY

The established Mahogany industry in the United States is made up of companies that are all American and of American origin. None is a branch of a foreign firm nor has any been developed by foreign individuals coming to these shores with a product to sell. It is an old industry, some of the firms dating back to the days of the clipper ships. The manufacture of Mahogany lumber and veneers gives employment to a large number of people in the United States.

The Mahogany industry tries at all times to preserve the good name that Mahogany has acquired through the years and to protect users and the public from those who would appropriate the name for other woods.

The Mahogany Association does not make or sell any finished products and should not be asked for quotations on anything illustrated in The Mahogany Book.



Mahogany display in the executive offices of the Mahogany Association, Inc.



"Say thou that dost thy father's table praise
was there Mehogana in former days?"

Bramcher, "Man of Taste," 1733

FOUR CENTURIES OF MAHOGANY

It is usual, in any survey tracing the use of Mahogany historically, to concentrate on its Golden Age, the 18th century and the first quarter of the 19th. Justly, for it was during this period that furniture first took on the size and design with which we are familiar today. It was this period, also, that witnessed the rise of the great Georgian master craftsmen and designers: Chippendale, Brothers Adam, Hepplewhite, Shearer and Sheraton, and their contemporaries in America, Duncan Phyfe, William Savery and others. In sheer beauty of design, craftsmanship and in the selection of fine materials, the furniture of this period has never been surpassed. Because it was usually made of Mahogany, it established this wood as the first choice for fine furniture ever since.

The Sixteenth and Seventeenth Centuries

Even before its Golden Age, however, Mahogany was playing a romantic role. There exists today, for example, preserved in the cathedral at Ciudad Trujillo, formerly Santo Domingo, a rough hewn Mahogany cross inscribed: "This is the first sign planted in the center of this field to mark the beginning of this magnificent temple in the year 1514." That inscription is our earliest record of the use of Mahogany. The cathedral that houses it, completed in 1540, is itself richly embellished with carved Mahogany, some of which is considered the finest in the world and is still in splendid condition after over four centuries in the tropics.

It was natural, of course, that Mahogany should see its first service close to one of its richest sources. And it is because of this

relationship that we owe its first introduction into Europe, like that of tobacco and other prizes discovered in the New World, to the sea rover, the pirate, the buccaneer. Cortez saw Mahogany used for boats in Santo Domingo and straightway adopted it for his own. Sir Walter Raleigh may have introduced Mahogany in England. The story is that when he returned to Britain in 1595, Queen Elizabeth admired the new wood. Sir Walter, with customary gallantry, commissioned his ship's carpenter to make her a Mahogany table! This, if true, was the first use of Mahogany in England.

Another story of the popularizing of Mahogany in England is that of Dr. Gibbons, who, in 1724 obtained samples from a sea captain brother to investigate its medical properties and had a candle box made by one Wollaston. The Duchess of Buckingham admired the box, had a table made of the same wood and thus started the fashion for Mahogany.

Seventeenth century choir stalls of Mahogany and cedar from the monastery of San Francisco, Lima, Peru



Meanwhile, we know from records that some quantity of Mahogany was making its way to both England and the North American colonies in pirate treasure ships. A record from the Colonial History of New York states: "A Spanish ship was captured loaded with Mahogany, copper and some canella (cinnamon) in October, 1654." And the London Gazette for February 22-25, 1702, carries: "By Principal Commissioners for prizes on Wednesday the 3rd of March next, at nine in the morning will be exposed to publick sale by the candle at Salters Hall in St. Swithern's Lane, London, out of Mary Man of War and the remaining goods out of the 'Little Galeon called Mary's Prize' Nicaragua and Mohogony wood and out of the 'Galeon Tauro or Somerset's Prize' tobacco, sugar, cocoa, brazilletto, Mohogony, ebbone and logwood . . ."

The first known European use of Mahogany was for the chanting desk, choir stalls, doors and for cases, shelves and desks in the great library of the Escorial, begun by Philip II of Spain in 1563 and completed in 1584. Its earliest known use in England was in Nottingham Castle, built in 1680.

Strangely enough, the earliest mention of Mahogany in England yet discovered uses the French name "Acajou." John Evelyn in his "Silva," 1662, says, "There are many kinds of wood in the Western Indies (besides Acajou) that breed no worms."

The oldest known Mahogany woodwork now in the United States are stalls taken from the Cathedral in Lima, Peru. These are now in the halls of the Hispanic Society in New York. These stalls were made about 1650.

Mahogany shows up in the official British import records for the first time for the period Christmas 1699 to Christmas 1700: "Jamaica, wood, mohogony 36 pc L5." If we only knew the size of the pieces, we would have the earliest valuation of Mahogany. English import records show that regular imports of Mahogany increased steadily so that by 1725 it was the wood of fashion in London and other large cities.

A very strange customs entry was made in 1770. Sixty tons arrived in London from Hudson's Bay! The detour of this ship from the West Indies to Hudson's Bay with almost a full cargo of Mahogany would be an interesting story.

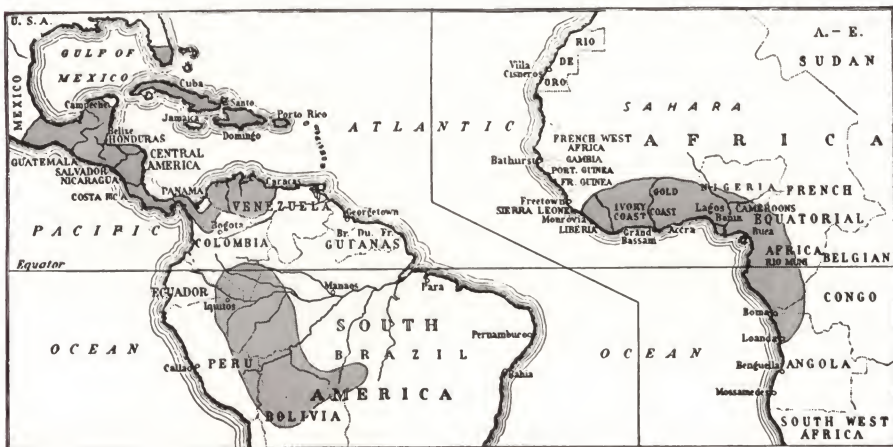
SOURCES OF MAHOGANY

The outline map below shows the regions in America and Africa where trees of genuine Mahogany grow. In the West Indies Mahogany is now produced in commercial quantities only in Cuba and Santo Domingo. The West Indian variety also grows in the southern tip of Florida but not in commercial quantities.

On the American continent, Mahogany ranges from southern Mexico, northern Guatemala and British Honduras through Central America to northern Colombia and Venezuela. Some twenty-five years ago, Mahogany was rediscovered on the tributaries of the upper Amazon in Brazil and Peru whence now come important supplies. The extent of this region is still very much unknown.

African Mahogany grows on the Ivory Coast, the Gold Coast and in Nigeria in West Africa. It is also found in the Cameroons, French Equatorial Africa and in Belgian Congo, but these sources are not well known and so far have contributed little to American imports. There is Mahogany on the East Coast of Africa and on the island of Madagascar that has not reached American markets.

The map below indicates the only natural habitats of Mahogany trees. Woods alleged to be Mahogany but coming from other than the regions indicated are not Mahogany. Woods purporting to be some kind of Mahogany but not from the regions listed above are not related botanically to Mahogany and should not be accepted as Mahogany.



Map Showing Areas Where Mahogany is Grown

THE MAHOGANY TREE

There are no Mahogany forests. Typically, the trees are scattered through the jungle here and there. An average of two trees to the acre is considered a very good stand. At first only the trees on the river banks were cut, and transportation was not a serious problem. These trees have long since gone so the hunt for Mahogany and its logging have been one long battle with the trackless tropical jungle.

After an area has been cruised and has been found to contain Mahogany in paying quantity and conditions permit getting it out, arrangements for the concession are concluded. Now main trails are cut and branch trails laid out to each tree. The trees are felled, and were originally pulled into the main trails by man power in Africa and by cattle in America. In recent years logging operations have been mechanized in most areas. Thence they go to the bank of a dry creek which has previously been cleared of growth and boulders. Here the logs are scaled and branded. When the floods come, everything else stops, and the drive is on night and day to get the logs to deep water before the floods subside.

If the floods are too violent, streams overflow and the logs are lost in the jungle. If the floods recede too rapidly, the logs are stranded until the following year. Sometimes the flood is so violent that the rush of logs will break the booms at the river's mouth and be carried out to sea where many are lost. Though every effort is made to salvage these valuable logs, the cost of so doing is often as great as the original logging costs.

The logs that get out are then formed into rafts and floated down to the ocean. Trouble isn't over yet, as getting these rafts over the bar and out a mile or more to the steamer is a perilous operation. If the sea is at all rough, the waves break over the bar with such force as to break up the raft and scatter the logs out to sea and up and down the beach. The fact that these waters are shark infested increases the danger. Even aboard the steamer, all danger is not past for more than one ship with cargo of Mahogany has not been able to weather a tropical hurricane.

The weather-beaten log that is unloaded at the mill gives little indication of the beauty that lies within and only suggests the ceaseless battle of the Mahogany tree for survival in the jungle and its long and eventful trip from the stump to the mill.

FOREST CHARACTERISTICS

The Mahogany tree is distinctive in shape, bark, leaves, fruit and flowers; and may be distinguished from other tropical trees by these characteristics just as the oak tree may be distinguished from the hickory tree in temperate zone forests. In its native forest, the Mahogany tree grows to immense size, sometimes reaching 150 feet in height and 10 feet to 12 feet in diameter. The average tree is usually 3 feet to 6 feet in diameter. The tree usually has a long, clean trunk, sometimes extending 60 to 80 feet to the first limb. The bark is gray-brown in color and varies from moderately rough to fairly smooth, in ridges or with large, individual scales. The leaf is compound, resembling somewhat the leaf of the American ash or hickory. The flower is very small,



Large Central American Mahogany tree showing buttress formation



Large Mahogany tree in Central American jungle

yellowish red and tulip-shaped. The seeds are contained in large, woody, thick-walled capsules, sometimes five inches to six inches in length. They grow upright on the branch, not pendant. The flat, winged seeds are packed tightly in the seed capsule and occur in either four or five parallel double rows, lengthwise of the seed capsule. The seeds, strangely enough, are the color of well-aged Mahogany wood, a reddish brown.

The mature Mahogany tree is truly the "King of the Forest" having survived, whole and sound, two centuries or more of the most intense struggle for existence in the steaming jungle.

BOTANICAL

The Mahogany tree has been classified by botanists as belonging to the order "Meliales," family "Meliaceae," sub-family or tribe "Swietenioideae," genera "Swietenia" and "Khaya."

Although the Mahogany tree has been known to Europeans since shortly after the discovery of America, or about 1500, it was not botanically classified until 1760 when it was named "Swietenia" by Nicholas Joseph Jacquin of Leyden, in honor of Baron Geraard Von Swieten, botanist and physician of Leyden. At that time the Mahogany trees of the mainland of Central America and the West Indies were classified as a single species and designated "Swietenia mahagoni" by Linné, who founded modern botanical classification in 1762.

In 1886 the principal mainland Mahogany was described "Swietenia macrophylla" by King from specimens originally from Honduras.

Mahogany was also found on Africa's West Coast and was first botanically classified in 1789 by Desrousseaux as "Swietenia senegalensis." In 1830 Jussieu differentiated geographically between the tropical American species of Swietenia and the African species of Swietenia, and proposed that the original name "Swietenia senegalensis" be changed to "Khaya senegalensis." Eventually, several species of the genus Khaya were recognized, but the most plentiful is "Khaya ivorensis."



Today huge tractors have replaced oxen in logging operations

KINDS OF MAHOGANY

West Indian Mahogany (*Swietenia mahagoni* Jacq.)

West Indian Mahogany, principally from Cuba and Santo Domingo, though very scarce today, is still preferred for certain parts of the finest furniture because of its close grain, silky texture and extraordinarily beautiful color. When newly sawed, this West Indian wood is yellowish white; but after exposure to sunlight and air, it rapidly changes to a reddish brown or in some cases to a deep, rich brown-red. It is heavier and harder than other kinds of Mahogany.

West Indian Mahogany wears as well as, if not better than, any other wood used in cabinetmaking. It works well and takes a beautiful polish, as evidenced by the exquisite pieces made by the old masters. Since 1946, Cuba has banned the export of Mahogany logs and lumber, thus virtually eliminating West Indian Mahogany from United States markets.

Tropical American Mahogany (*Swietenia macrophylla* King.)*

This includes all Mahogany growing on the mainland of Central and South America from southern Mexico to Colombia and Venezuela and including all Central American countries. In South America, however, it is generally limited to the upper Amazon basin in western Brazil, Peru and Bolivia. Of the Central American Mahogany, the best known is Honduras. Mahogany from the upper Amazon basin is frequently distinguished as either Peruvian or Amazon Mahogany, depending upon its source in Peru or western Brazil. In this region it is called "Aguano."

The texture of all tropical American Mahogany is slightly more mellow than West Indian and is inclined to be of straighter grain. Because of the larger and straighter logs, longer and wider cuttings are obtainable. The wood from the basin of the upper Amazon in Western Brazil and in Peru is a little firmer in texture and slightly heavier than Central American Mahogany so that it is preferred by some users for carving. On the other hand, Central America produces more figured logs, which are the source of many types of beautiful veneer.

* A third species, *Swietenia humilis* Zucc., is found sparingly in western Central America. It is of very minor commercial importance, but the wood closely resembles Cuban Mahogany.

AFRICAN MAHOGANY (*Khaya ivorensis* A. Chev.)

African Mahogany, the principal sources of which are the Gold Coast, Ivory Coast and Nigeria, is obtainable in exceptionally large sizes. The logs measure from fourteen to thirty-six feet in length, from three to five feet in thickness and yield longer and wider cuttings than any other type of Mahogany.

When freshly cut, the African wood is a more decided salmon pink than West Indian or American Mahogany; but this color, after exposure to air and light, changes to a pale, reddish brown. The wood has a milder texture and slightly larger pores than other Mahogany.

It is more lavishly figured than other Mahogany. For that reason, in addition to the immense size of the logs, a large amount of Mahogany veneer is African. The figure, amazing in its variety and beauty, ranges from the simple, straight stripe to the rich and complex figures of mottle, crotch and swirl.



TROPICAL AMERICAN MAHOGANY
(*Swietenia macrophylla*)

A. Leaf (Compound with leaflets like an ash leaf).

B. Flower cluster (Few survive, grow into large pod with many seeds).

C. Fruit (A pod larger than an egg that splits open liberating many seeds).

D. Seed (Flattened with wing mostly at one end).

E. Flower (In cross-section).



AFRICAN MAHOGANY
(*Khaya ivorensis*)

A. Leaf (Compound with leaflets like an ash leaf).

B. Flower cluster (Few survive, but grow into large pod with many seeds.)

C. Fruit (Similar in structure to *Swietenia* but shorter and more rounded).

D. Seed (Flattened but winged all the way around).

E. Flower (Similar in structure to *Swietenia*).

MAHOGANY WOOD

Mahogany wood has distinctive characteristics that make it comparatively easy for the wood technologists to distinguish it from other kinds of native or tropical woods. Most people identify Mahogany by the grain and figure and to some extent by the color. The matter of identification is much more definite and accurate with the use of a microscope.

Without a hand lens, when one looks at an end surface of Mahogany, the pores show up as tiny dots or pin pricks. On more or less longitudinal surfaces, the pores show up as fine pen lines, dashes or dots accordingly as the cut is with the grain, or slightly across it.

In the end section, concentric growth lines usually are present in American Mahogany and are generally lacking in African Mahogany.

Figures 1 and 2 from the Forest Products Laboratory show the cross-sections of Mahogany enlarged fifteen (15) times.

It will be noted that pores in Mahogany vary somewhat in size but are rather uniformly scattered. Some of the pores appear

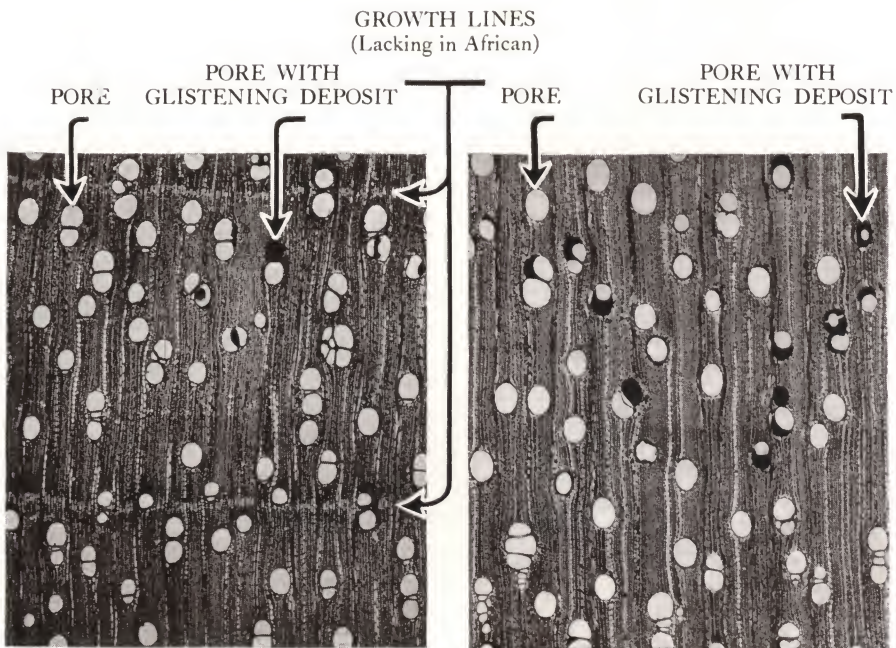


Figure 1
TROPICAL AMERICAN MAHOGANY
Cross-section magnified 15 times

Figure 2
AFRICAN MAHOGANY
Cross-section magnified 15 times

to be filled or partially filled with a dark, glistening substance. This scattered substance in the pores is typical of Mahogany and distinguishes it from all the Philippine Dipterocarps, and also from a number of other woods which are occasionally substituted for Mahogany.

The other conspicuous markings that show in the cross-section are the numerous whitish vertical lines that are more or less parallel and about the thickness of a pore apart. These are fine ribbony bands of tissue that run from the center of the tree to the circumference and make the "flake" or "sycamore grain" that shows when the wood is cut on the true quarter. They are called "pith rays." In oak these are much larger and are very conspicuous when the wood is cut on the quarter.

Figures 3 and 4 from the Forest Products Laboratory show tangential surfaces; that is, at right angles to the quarter or radial surface. On these surfaces the pores show as long, slightly irregular perpendicular lines; while between them are numerous very short fine lines. These are the end views of the pith rays; and in Tropical American Mahogany they are in rows (storied) while they have a staggered arrangement in African Mahogany.



Figure 3
AMERICAN MAHOGANY — Showing
"storied" rays tangential section. Magni-
fied 5 times



Figure 4
AFRICAN MAHOGANY — Showing
staggered rays tangential section. Magni-
fied 5 times

PHYSICAL PROPERTIES

Through the experience of generations of cabinetmakers and the sturdy service that it has rendered, even in delicately fashioned chairs and tables, Mahogany has acquired the reputation, to a superlative degree, of having all the characteristics that make an ideal cabinet wood. This reputation was won long before there were scientific laboratories for testing the mechanical properties of wood. When established, however, they abundantly confirmed the experience of the cabinetmaker that Mahogany was truly the king of the cabinet woods.

The Forest Products Laboratory made a series of practical tests of common woodworking operations, including mortising, boring, planing, shrinking, warping, shaping and turning. Based on the results of these tests the woods were classified in three groups. Mahogany was placed in Group I in every one of these operations. No other wood made that rating.

These tests show the practical woodworking qualities of various woods and confirm why the cabinetmaker has always preferred Mahogany. Mahogany is also extremely resistant to termites and to the organisms of decay.

Mahogany is usually considered an "indoor" wood because of its beauty; but it has proved its excellence for outdoor use, especially in modern home architecture.



Opening a fine Mahogany log in the sawmill. This is an example of the large dimension in which fine textured Mahogany is available

AVERAGE PHYSICAL AND MECHANICAL PROPERTIES OF GREEN AND AIR-SEASONED MAHOGANY

*Based on Tests of Small, Clear Specimens Two by Two Inches in Cross-section
Bending 28-inch Span*

(U. S. Forest Products Laboratory)

<i>Species:</i> COMMON AND BOTANICAL NAME, LOCALITY WHERE GROWN	(Khaya sp.) (Africa)	(Swietenia sp.) (Mexico)	(Swietenia sp.) (Northern Cuba)
NUMBER OF TREES.....	6	9	1
Note: Values for green timber on first line, for air dry on second line.			
MOISTURE CONTENT — %.....	55 12	58 12	48 12
SPECIFIC GRAVITY OVEN DRY BASED ON: Volume when tested.....	.43 .45	.45 .46	.57 .59
Volume when oven dry.....	.47 —	.50 —	.61 —
SHRINKAGE GREEN TO OVEN DRY CONDI- TION — %			
In volume.....	8.8 —	7.7 —	6.0 —
Radial.....	4.1 —	3.5 —	2.7 —
Tangential.....	5.8 —	4.8 —	3.3 —
STATIC BENDING			
Fiber Stress lbs. per sq. in.....	5,050 7,890	6,120 8,830	4,560 7,100
Modulus of rupture lbs. per sq. in.....	7,600 10,690	9,240 11,220	8,250 9,600
Modulus of elasticity (1000 lbs. per sq. in.)	1,180 1,480	1,290 1,430	1,070 1,190
Work to max. load (inch lbs. per cu. in.)	8.5 7.8	10.2 6.8	8.6 6.2
IMPACT BENDING — 50-pound hammer HEIGHT OF DROP TO CAUSE COMPLETE FAILURE (Inches).....	26 22	27 22	23 —
COMPRESSION PARALLEL TO GRAIN CRUSHING STRENGTH (Pounds per sq. in.).....	3,670 5,700	4,540 6,420	4,170 6,250
COMPRESSION PERPENDICULAR TO GRAIN, FIBER STRESS AT PROPORTIONAL LIMIT (Pounds per sq. in.).....	650 980	710 1,210	980 1,760
HARDNESS: — Load required to imbed a 0.444-inch ball to one-half its diameter (Pounds)			
End }	570 1,080	750 880	990 1,350
Side }	510 790	650 760	980 1,350
SHEARING STRENGTH PARALLEL TO GRAIN (Pounds per sq. in.).....	1,270 1,340	1,310 1,060	1,540 1,480

Note: We have printed air dry figures in heavy type.

MAHOGANY LUMBER

No American hardwood and few woods of any kind produce the excellent grade of lumber found in Mahogany. Grade for grade, Mahogany is superior to any other cabinet wood in lengths, widths and freedom from defect. This, together with its strength and stability, was the reason it was specified for PT boats and aircraft in spite of wartime shipping scarcity and transportation hazards.

There is a grade and thickness of Mahogany lumber of suitable length and width for every use. Mahogany is the only wood in which it is possible to supply "figured" lumber in quantity and at only a nominally higher cost than for plain lumber.

Woodworkers and cabinetmakers are unanimous in their preference for Mahogany because of the freedom from waste, uniformity in color and texture, the ease of getting large, clear cuttings, freedom from sap, the ease in producing a smooth surface requisite for a fine finish, and last, but far from least, Mahogany's rare and permanent beauty and stability. Craftsmen of all ages have preferred quality materials with which to work.

Official rules for grading all hardwoods are available, at twenty-five cents per copy, at the National Hardwood Lumber Association, 59 East Van Buren Street, Chicago (5).



These weatherbeaten logs give little indication of the beauty that lies within



Slicing Mahogany veneers. The log is clamped to the back plate which swings down at an angle past the knife edge removing a sheet of veneer from the face

MAHOGANY VENEERS

Mahogany veneers have been used in increasing amounts for about two hundred years. Veneers of the finer type have been produced on a large scale only during the past one hundred years, with the period of greatest development in the last fifty years. The earliest veneers were sawed, a method still in vogue in a small way, producing excellent veneers. However, about half the block or flitch goes into sawdust, so the method is expensive. Sawed veneers must be used for thicknesses greater than can readily be sliced and for lengths greater than 16 feet. Sawed veneers do not match well.

Most Mahogany veneers are cut on what is known as a slicer. (See above.) This machine weighs many tons and slices sheets of veneer from a section of a log known as a flitch. A flitch may be half or a quarter of the log, depending upon the size of the log or the type or figure desired. Flitches are first steamed to make possible smooth, even cutting. The veneers are dried and piled back in the sequence in which they come from the log. These piles of veneers from one cutting are also known as flitches. Standard thickness is $1/28''$.

Veneers are noted for their unusual lengths, widths and their freedom from wasteful defects.

Mahogany veneer also is produced by fine circular saws in thicknesses greater than standard. This method is wasteful as $\frac{1}{3}$ to $\frac{1}{2}$ of the log goes into sawdust. Half-round is off-center cutting on a lathe, a method often used in producing swirl veneer.

MAHOGANY PLYWOOD

One of the most important ingredients in much furniture of current manufacture, and one due to exert an increasingly strong influence on furniture is plywood. Plywood, as you know, is a composite board made of several layers of wood glued together with the grain of each running at right angles to that of the next. The number and character of the layers vary according to use and quality. Typically, furniture plywood is three or five ply, the latter usually considered the better.

Even in the past, the use of plywood has given the furniture manufacturer certain advantages. Though it is not true that plywood is actually stronger than solid lumber, it is true that



A cut back sketch showing a section of a 5-ply Mahogany panel

wood is stronger with the grain than across it and that plywood thus serves to equalize strength and shrinkage in both directions. It is also true that the use of richly figured veneers makes possible a more decorative surface than is within reach of solid lumber. Thus for large, sheer surfaces especially, plywood has distinct advantages in appearance, weight and stability.

As in all man-made products, however, plywood varies tremendously in quality. The making of high-grade plywood requires extreme care. Lumber core stock of narrow edge-joined pieces must be dried to proper moisture content, perfectly smooth, flat and free from defect, skillfully edge-joined and glued. Cross-banding must be of uniform thickness, also properly dried and joined. Face veneers likewise require exact drying, matching and taping, and should be the same on both sides of the panel.

Even with all materials in proper condition, success or failure lies in the kind, the amount and application of the glue, in proper drying and sanding after gluing. As a result, plywood varies according to the care and skill put into its making. There is much excellent plywood furniture on the market, and the use of mahogany plywood is increasing in many fields.

The discovery of modern synthetic resin glues, however, even before the war, had done much to revolutionize the manufacture of furniture plywood. Not only do they reduce the difficulties of manufacture, but they produce a plywood that is equally strong in both directions of the grain. In addition, the tremendous use of plywood in war production has vastly improved both method and product. Mahogany plywood consequently plays an increasingly important role in the design, quality and price of Mahogany furniture.

There is no doubt that the continued development in plastics will make itself useful in combination with plywood. Such combination will make possible the introduction of color and other decorative treatments in plywood surfaces. Plastic adhesives, together with heat and compression, will give hard, pre-finished and beautiful surfaces that will resist the most rugged usage. In fact, advances in technology in plywood construction open a whole new woodworking field to the designer, the architect and the fabricator.

This field will run the gamut of cabinet products, furniture, radio, television, pianos, boat building, and architectural woodwork. Not only will such plywood serve better in its conventional use with solid framing, but it will be structural as well. "All plywood" tables, chairs and cabinets are possible and practical. It is well to remember that such things are not developed overnight. It takes time to discover the best in new materials and processes. In fact, exploration of the possibilities in moulded plywood has only just begun. The next few years will see many interesting developments.



The almost unbelievable strength of moulded Mahogany plywood is strikingly illustrated by this small boat hull in which the plywood alone supports the weight of four men

"SOLID" vs. "VENEER"

Probably the most frequent question we are asked is this one. "Is solid Mahogany better than veneered Mahogany furniture?" This is a question that cannot be answered by "yes" or "no." The furniture manufacturer has two forms of Mahogany available for use in furniture construction, solid Mahogany lumber and Mahogany plywood panels.

Both are quality products. The excellence of Mahogany lumber is proverbial. Mahogany plywood made with resin glues under heat and pressure is equally good.

As a matter of fact, neither term is any criterion of either age or quality. Most Mahogany chairs are made of solid lumber today just as they were during the 18th century. Modern pieces, as well as many famous and valued antiques, are supreme examples of the skillful use of veneer.

The difference is, in most cases, merely a practical one. Small carved pieces are more effectively made of solid lumber than of plywood. Large and highly figured panels are more easily produced by veneering than from solid lumber. For the rest, it's a matter of taste. Solid Mahogany is usually conservative in design and figure, depending on line and turning or carving for ornament. Veneered furniture is usually of a lighter type, more brilliantly figured. Much furniture is a combination, using solid lumber for structural parts, plywood for surfaces between the framing. Dining room and bedroom furniture, in both traditional and contemporary design, are typical of this type of construction.



This chest, solid Mahogany frame, top, sides and front Mahogany-faced plywood, shows a beautifully matched crotch figure



This chest, made of solid Mahogany lumber, shows a modest but pleasing figure

FIGURE IN MAHOGANY

Few, if any, other cabinet woods display the wide range of figures found in Mahogany. These figures, however, are distinctly tropical in their character and in a measure distinguish Mahogany from the woods produced in the temperate zones.

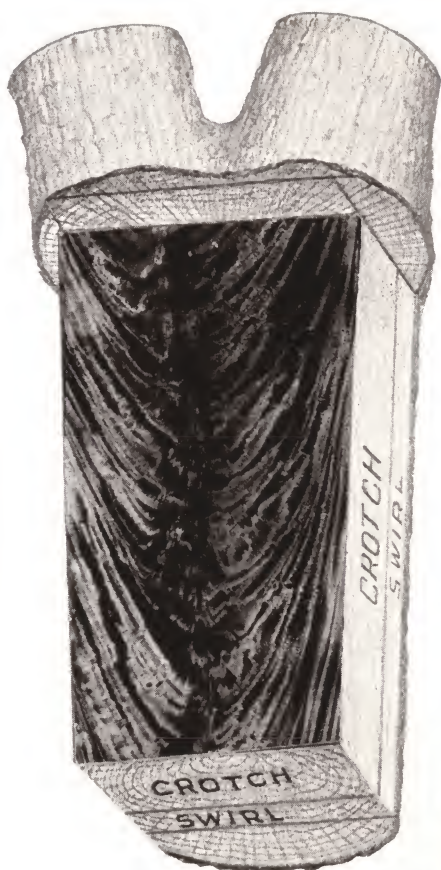
The figure most commonly seen in Mahogany is the stripe which shows more or less in all Mahogany that is cut on the quarter. The stripe may be broad or narrow, bold or mild, long or broken. The flat cut or leaf figure is the other of the two basic patterns, to which all other figures are added.

The pores in Mahogany that show as penlines, dashes or dots give depth to the wood and also accentuate the turns and twists in the grain, which are responsible for the principal figure in Mahogany. The irregularities of the grain also create the flash and glimmer of light and shadow that are such a part of the beauty of Mahogany.

The illustrations shown on inside cover pages and color pages are typical figures and patterns to be found in Mahogany. Plates 6, 8, 19, 20, 21, 29, 30 and 32 show matched effects. The plates showing figure types have been selected with great care, but it should be kept in mind that the type illustrations cannot be exactly duplicated. One should expect some variation not only between different fitches but also within a single fitch.



A large and weathered Mahogany log, the surface of which reveals that it is highly figured

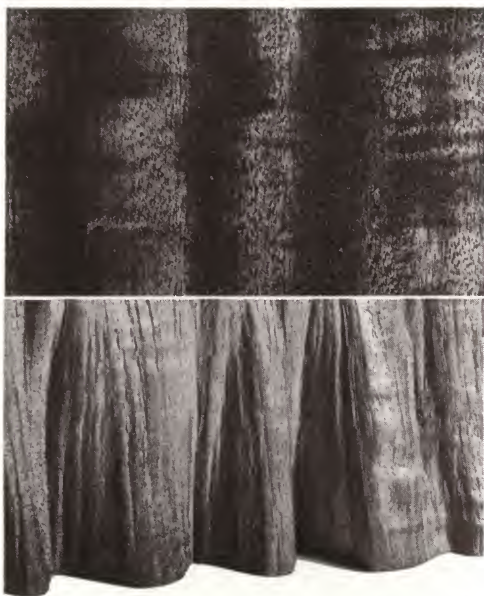


CROTCH

Mahogany's famous crotch figure comes from the trunk of the tree just below where it forks into two nearly equal branches. The outer portions of this block, top and bottom, produce swirl figure veneers that gradually merge into the true crotch figure produced from the central part of the block. Note that the crotch figure is inverted when used on the vertical surfaces of furniture.

STRIPE AND MOTTLE

The figure to the right shows Mahogany split on the quarter with the grain. The alternate out-and-in direction of the grain produces the typical stripe figure of Mahogany. If in addition to this interlocking grain there are also cross wrinkles in the grain, the stripe figure becomes a mottle. The variation in the interlocking grain areas and the cross wrinkles gives rise to the endless variety and combinations of stripes, broken stripes, mottle and fiddleback figures.



MAHOGANY FINISHES

Why do we finish wood? We do it for four very good reasons:

To Seal the Surface. This prevents easy access or emission of moisture which tends to cause swelling or shrinking with their attendant evils.

To Facilitate Cleaning. Finished wood cleans easily while raw wood is very difficult to clean.

To Bring Out Depth and Luster. Finishing a surface brings out the figure or pattern of the grain and fully reveals the depth and luster of Mahogany.

To Change Color or Tone. This has been overdone in the past, but the best finishing practice requires color changes to get uniformity and to produce at once the mellow tones that Mahogany otherwise acquires only with age. For contemporary designs there are many new light finishes to achieve various honey tones.



Even though modern technology has speeded up some finishing operations, the final waxing and polishing continues to be a hand job

Two fine finishes on Mahogany are the oldest: shellac and wax; and oil and wax. These processes, if done properly, take a lot of time and the skill of an expert finisher, therefore are expensive. Both were in common use during the 18th century.

Mahogany, in the past, has suffered in reputation because of improper finishing. This may seem strange when we recall that Mahogany responds to fine finishing as perhaps does no other cabinet wood.

From 1850 until recent years, there gradually developed the practice of staining Mahogany so dark that any kind and color of Mahogany could be made uniform. Then several wood substitutes came along, principally for framework, that required even more staining to conceal the fact that these woods were not Mahogany. The final result was a stain that resembled very dark red paint just too thin to conceal the grain of the wood entirely.

With the true beauty of the wood thus obliterated, multiple coats of gloss varnish were added. Even though rubbed "egg-shell," this finish promptly reverted to gloss through vigorous applications of furniture polish.

In more recent years Mahogany finishes have been improved tremendously. For traditional furniture, there is the "Old World" type of finish. Such finishes very closely approximate the gleam and luster found on rare old museum pieces that have aged naturally.

In addition to the traditional finishes, there is a long list of the lighter finishes that are based on bleaching but which, in the honey tones, give the light color popular in Modern design and bring out the richness of the grain and figure. These intermediate finishes have largely replaced the earlier "blonde" type.

Mahogany is a grand cabinet wood; in fact there is none better. But to be at its best, it must be given a chance to show its true beauty and its ability to age gracefully. It will do this, and at the same time give practical service, only if stains are used with restraint. It is better to err on the light side as the wood naturally darkens with age.

For those interested in greater technical detail on finishing techniques, the following Mahogany Association bulletins are available and will be forwarded, gratis, upon request: Mahogany Finish Bulletin; Finish Repairing and Refinishing; Care of Mahogany Furniture.

THE COVER

The cover of this eighth edition of The Mahogany Book pictorially presents a rather dramatic story. The wood pictured is, of course, Mahogany but shown in a variety of finishes from light to dark and others between the two extremes.

We have purposely confined these various finishes to a single type of figure — the stripe or ribbon figure. This eliminates the influence of differences in the grain when comparing finishes. However, when the wide variety of finishes is multiplied by the variety in Mahogany figures, the designer may obtain most of the effects that are possible on any wood.

The advantages of this adaptability are obvious. As a seasoned dealer recently remarked, "These new woods are interesting but don't forget that Mahogany is the solid gold of furniture." To the maker and dealer, this acceptance of Mahogany means more and better sales. To the public, "Mahogany" means enduring beauty, faithful service and a justifiable pride of ownership.

Because Mahogany offers the perfect medium of expression for any design theme in furniture or cabinet work, why experiment with woods that have less to offer in beauty, versatility and permanent satisfaction?

Formulas for obtaining any of the finishes shown on the front and back covers are available from the Mahogany Association.

MAHOGANY SUBSTITUTES

Since Mahogany gained its fine reputation as a superior cabinet wood more than two hundred years ago, there has been a world-wide search for something "just as good." At the same time Mahogany has been widely imitated. Almost endlessly, various woods — mostly from the tropics — have been offered as Mahogany. Usually these woods are offered with a qualifying prefix. In the past, non-Mahogany woods have been offered as "East Indian Mahogany" (padouk), "White Mahogany" (prima vera), "Colombian Mahogany" (albarco), "Australian Mahogany" (Dysoxylum), "Demerara Mahogany" (andiroba), "Cherry Mahogany" (makoré), "Burma Mahogany" (thitka), "Brown Mahogany" (sapele), "Sapele Mahogany" (sapele), "Gaboon Mahogany" (okoume), "Birch Mahogany" (birch), and "Philippine Mahogany" (dipterocarps), discussed on page 32, "Costa Rican Mahogany Carapa species" (crabwood), and many others. Most of these woods are now sold under their true names.

"Philippine Mahogany" is the most persistent and "Costa Rican Mahogany — Carapa species" is the newest misuse of the name "Mahogany." It is especially deceptive because Mahogany actually grows in Costa Rica and the addition of Carapa — the botanical name for crabwood — is little or no warning to the public that the wood is actually crabwood, also called Andiroba, and Cedro Macho.

In the last few years, another imitation Mahogany has come on the market — one that is rather difficult to detect. This is a photographic reproduction of highly-figured Mahogany veneer, usually a crotch or swirl. It is made by a process similar to that employed in making decalcomanias. Its greatest use has been on fine television cabinets that otherwise are of Mahogany. In fact, the surface to which this "picture wood" is applied is often of plain, unfigured Mahogany. Naturally, the picture reproduced is of the finest and most beautiful crotch or swirl that can be obtained. This imitation can be detected best by the fact that the light and dark areas are always the same, no matter from what angle observed. With real Mahogany, the light and dark areas interchange when viewed from the opposite angle. Where there is an opportunity to see several of the same cabinets, the picture wood is always identically the same. This is not true with real Mahogany.

Since this picture film is incredibly thin, its ability to stand up under the mishaps of every-day service may well be questioned.

It is hoped that a proper name or description for this process can be devised, that will be acceptable to the users and fair to the unsuspecting public.

This is a time when manufacturers, particularly those without previous experience in the use of Mahogany and without established sources of supply, should ask for samples; and, if in doubt, have them properly identified. Also, they should insist that Mahogany be properly identified on invoices. If the wood is Tropical American Mahogany, it should be "Guaranteed Swietenia Mahogany"; if of African origin, "Guaranteed Khaya Mahogany of standard commercial quality."

For the public the best assurance of getting Mahogany is to deal only with firms having an established reputation and to insist that the furniture bear the official Mahogany labels or tags.



Solid Mahogany dresser, commonly referred to as a "Mr. and Mrs.", and typical of the fine furniture bearing the positive wood identification of the Mahogany Association label

DESCRIPTIONS OF WOOD FURNITURE

The prospective buyer of furniture should know that there are definite rules for describing wood furniture. These rules were established in 1925 by the Federal Trade Commission after conferences with Better Business Bureaus, lumber and furniture industries. These rules with interpretations are self-explanatory; but it should be especially noted that wood descriptions apply only to exposed surfaces.

RULES FOR THE DESIGNATION OF FURNITURE WOODS

RULE I — Furniture in which exposed surfaces are of one wood shall be designated by the name of the wood.

RULE II — Furniture in which the exposed surfaces are of more than one kind of wood shall be designated by the names of the principal woods used.

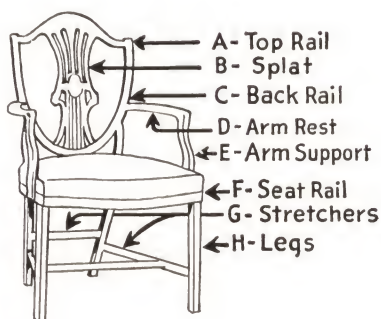
INTERPRETATION OF RULES

1. Exposed surfaces mean those parts of a piece of furniture which are exposed to view when the piece is placed in the generally accepted position for use.
2. The exposed surfaces of all furniture or parts thereof represented as solid shall be of solid wood of the kind or kinds designated.* (If veneered on the same wood, it may be designated as a wood of that particular kind. If veneered on a different wood, it shall be described as veneered.)
3. Cabinet woods, used for decorative purposes where the effect is solely to add to the artistic value, shall be named as decorations only.
4. A wood popularly regarded as of lesser value, if its use is essential to construction, need not be named under Rule II, if less than a substantial amount is used on exposed surfaces.
5. A wood popularly regarded as of higher value, shall not be named under Rule II, if an insubstantial amount of that wood is used, except as provided in Interpretation 3, above.
6. Designations shall be made in the caption or body of each particular description without qualification elsewhere.
7. The word "Finish" to designate color, shall only be used as a description, following the name of the wood used.
8. Where furniture is catalogued, tagged, labeled, advertised or sold, by retailers, it shall be in accordance with these Rules and Interpretations.
9. Where furniture is catalogued, tagged, labeled, advertised, invoiced, or sold, by manufacturers, manufacturers' representatives, jobbers or wholesalers, it shall be in accordance with these Rules and Interpretations.
10. The above Rules need not apply to antique furniture.

* The validity of the portion of rule No. 2 included within the brackets was challenged by the Berkey & Gay Furniture Company, et al., in a proceeding before the United States District Court of Appeals, 6th Circuit. Under date of June 28, 1930, the United States Circuit Court of Appeals set aside this portion of Interpretation No. 2. The F. T. C. maintains that the above decision would not be controlling in any new proceedings; nevertheless the fact that no appeal was taken by the F.T.C. from the decision raises a serious question as to the validity and enforceability of this portion of Interpretation No. 2.

Unfortunately, some furniture may look like Mahogany yet be made, all or in part, of other woods. The following diagrams will be helpful in checking a prospective purchase to make sure that all exposed surfaces are of Mahogany.

WHERE TO LOOK FOR SUBSTITUTES



CHAIR . . .

The seat rail, arm supports and legs are the parts most commonly substituted. To be genuine Mahogany, the parts as indicated, also should be Mahogany.

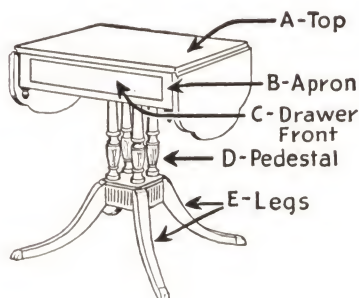
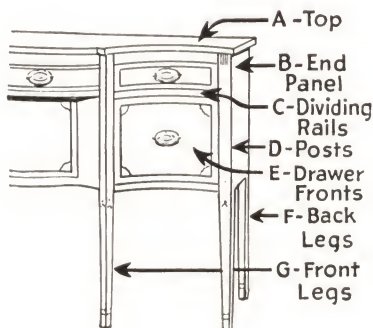


TABLE . . .

The most common substitution in tables is a Mahogany top with supporting parts in a substitute. To be sure of getting genuine Mahogany, the parts as indicated also should be Mahogany.



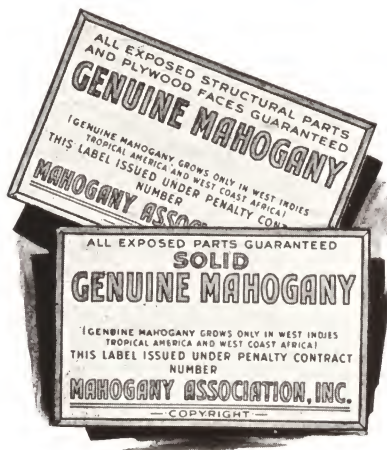
SIDEBOARD . . .

When there is substitution in "cases" the top and drawer fronts are usually Mahogany. The parts as indicated also should be Mahogany.

MAHOGANY LABELS

If you are buying Mahogany, you want to be sure Mahogany is what you are getting. The name "Genuine Mahogany" has earned so high a standing that there is tremendous temptation to misuse it. Accordingly, low-priced furniture is frequently made of such native woods as birch and gum, finished to resemble Mahogany. This so-called "Mahogany finish" must be accepted as such, not as Genuine Mahogany.

A common misuse of the name is for woods such as lauan or tanguile, found in the Philippines and from trees in no way related to Mahogany. Genuine Mahogany is not native to the Philippines. Thus "Philippine Mahogany" — a name legally permissible but highly controversial — bears the same relation to Genuine Mahogany as "Hudson Seal," which is dyed muskrat, does to genuine seal.



Blue Label, Genuine Mahogany
Red Label, Solid Genuine Mahogany



The grooved dowel joint, a modern improvement, is one of the distinguishing marks of well made Mahogany furniture

Because of efforts to usurp the good name of Mahogany, the Mahogany Association has authorized exclusive copyright labels and tags, and issues them to responsible manufacturers for use on their products under a license which provides severe penalties for misuse. These labels not only assure you that the piece is Genuine Mahogany, but specifically indicate whether or not it is solid or a combination of solid and Mahogany plywood. They thus form a guarantee which vastly simplifies buying problems.

All Mahogany furniture may not bear these labels, but all furniture with these labels is Genuine Mahogany with the triple guarantee of the Mahogany Association, the manufacturer and the dealer.

HOME FURNITURE

The most important use of Mahogany in the United States is in the manufacture of home furniture. The popularity of Mahogany gained steadily during the ten years prior to World War II. In fact, it became and still is the leading fine cabinet wood of the country.

During the war, all suitable Mahogany was reserved for aircraft and fast naval boats, so supplies for civilian use were restricted. After the war, the use of Mahogany increased steadily to the all-time record of 1950. Thus, Mahogany regained and extended its dominant place in good furniture.

With its quality attested by its historical record and scientific tests, confirmed by its outstanding war record, and supplemented by its permanent beauty, Mahogany has what it takes to make really good furniture.

How to Tell Quality

When buying any style of furniture, 18th Century or Modern, the shopper who has decided to buy Mahogany has a distinct initial advantage. Mahogany is in fact as well as in reputation the finest furniture and cabinet wood known. Few manufacturers, even the least conscientious, would be so impractical as to waste a first quality wood in a piece of shoddy construction, poor design or bad finish.

Nevertheless, since much of the real quality of furniture is not apparent on the surface, especially to the inexperienced buyer, it is always wise to patronize only those stores



The Mahogany furniture made by the Master Craftsman of old is no better than that which can be and is made from this fine wood today. But remember:

"There is hardly anything in the world that some man cannot make a little worse and sell a little cheaper, and the people who consider price only are this man's lawful prey."

— Ruskin



Mahogany chest in the finest 18th Century tradition. Such a piece is characteristic of the fine reproductions now available from America's better manufacturers. Its finish is typical of the trend toward lighter, more golden tones

that have a well established reputation for honest merchandise and honest merchandising. This is particularly true when scarcities threaten quality.

In addition, check those earmarks of quality which you can see for yourself. Carvings should be clean and smooth. Plywood surfaces should be smooth and flat. Stand so the light strikes a table top at an angle, and look for any waviness or depressions.

Note whether drawer interiors have clean, dovetail or lock-joint construction and are smoothly finished. Turn up chairs to see if the

frame is well joined, with tight-fitting, glued and screwed corner blocks. Look for a finish that really reveals and enhances the wood. Compare the furniture you contemplate buying with furniture you know is of fine quality.

In furniture of contemporary design in light or honey tones, be especially sure that it is Genuine Mahogany, not only on the plywood surfaces but also on the exposed solid parts.

Beware of high pressure selling methods and undue emphasis on easy credit terms. Remember it is far better to buy a few good pieces, adding as you can, than to buy many inferior pieces from which you can anticipate neither service nor satisfaction. And before you close the deal, ask the salesman to confirm his oral statements: "Genuine Mahogany," "Solid Mahogany," "Hepplewhite," etc., on the written order. The ethical dealer will not hesitate to do so and such a precaution protects the buyer if the merchandise is not as represented.

THE GOLDEN AGE OF MAHOGANY 1725—1825

While Mahogany was known and used during the 17th century, it was not until after 1725 that it came fully into its own, marking the beginning of the Golden Age of Mahogany. Prior to this time, the bulk of furniture in Europe was heavy, almost grotesque in style and made principally of native woods. Moreover, until about 1725 the cost of a cargo of Mahogany in those troublesome days made it a very expensive luxury.

By 1724, during the reign of George I, Mahogany had found its way into the English royal household. The Royal Bill Books of that date have entries:

2 Mahogany Desert tables upon brass wheels.....	£ 31-10
2 Mahogany Clothes Chests.....	£ 16-00
A Mahogany Supping Table.....	£ 4-00

In his book, "English Homes of the Early Georgian," however, H. Avray Tipping mentions the use of Mahogany as early as 1671, "while," he says, "in the reign of Queen Anne, it gradually supplanted walnut in the cabinet-maker's esteem." MacIver Persival's "Old English Furniture," mentions polished Mahogany tables for cards and tea, which could be shut and placed against the wall when not in use. Singleton, Symonds and Gillingham have all shown that Mahogany was being used regularly, though in a limited way, both in England and in the Colonies as early as 1700. And by 1715, when the styles we know as Queen Anne were fairly well established, Mahogany was becoming more and more available.

One of the most extensive and important early uses of Mahogany in England was in 1730 by architects, Campbell and Kent. At Houghton Hall, the palatial home of Robert Walpole, Premier of England, whole cargoes were used for doors, panelling and furniture.



A life-size figure in Mahogany carved by the contemporary sculptor, Octavio Medellin

CHRONOLOGICAL TABLE OF STYLES

This chart shows the order of period styles from the beginning of the Renaissance to the early 19th century. No attempt is made to show American periods, as in the main they followed the English styles. French influence came by way of England, at least until after the American Revolution. The double black line marks the earliest recorded use of Mahogany in furniture except in Spain and in Spanish Colonies, where it was increasingly used after 1500.

E N G L A N D				Remarks	F R A N C E		
Sovereign		Style			Style		Sovereign
House of Tudor	Henry VIII 1509-1557	Tudor	ENGLISH RENAISSANCE PERIODS	About the duration of the Renaissance Period in other countries.	FRENCH RENAISSANCE PERIODS	Francis Premier	Francis I 1515-1547
	Elizabeth 1558-1603	Elizabethan		Henri Deux		Henry II 1547-1559	
	James I 1603-1625	Jacobean				Italy 1443-1546	Francis II 1559-1560
	Charles I 1625-1649					Germany 1525-1620	Charles IX 1560-1574
	Commonwealth 1649-1660 Oliver Cromwell Lord Protector					Flemish and Dutch 1520-1634	Henry III 1574-1589
Stuart Line	Charles II 1660-1685			Other European Countries 1500-1630	Baroque	Henri Quatre	Henry IV 1589-1610
	James II 1685-1688	Louis Treize				Louis XIII 1610-1643	
House of Orange	William and Mary 1688-1702	William and Mary	Baroque Styles Beginning of the Rococo	Rococo	Louis Quatorze	Louis XIV 1643-1715	
	Anne 1702-1714	Queen Anne			Regency 1715-1723	Louis XV 1715-1774	
House of Hanover	Early Georgian (Geo. I) 1714-1727	Decorated Queen Anne	Georgian Period	Classical	Louis Quinze Provincial		Louis XVI 1774-1793
	Middle Georgian (Geo. II) 1727-1760	Chippendale			Louis Seize Provincial	Napoleon 1795-1814	
	Late Georgian (George III) 1760-1820	Adam Hepplewhite Sheraton					Directoire Consulate Empire
	George IV 1820-1830	English Regency					



QUEEN ANNE 1702—1714

This Mahogany chair is essentially Queen Anne in design and a fine example of the wood's earlier use in England

AMER

It is very important, especially for the beginner, to realize at the start that the classification of furniture styles is at best imperfect. That is why much that has been written on the subject is contradictory. The earliest styles are designated by names that cover many centuries such as Egyptian, Greek, or Roman. These overlapped and intermingled as one borrowed from another. Later styles were designated by ruling monarchs, such as Louis XV, William and Mary, or Queen Anne.

Not until the 18th century did the names of designers or cabinetmakers appear to indicate a particular style. Even so, there are other terms, such as Georgian, Early or Late 18th Century, Federal American, that cover the same styles. The 18th century brought us four outstanding style names — Chipendale, Adam, Hepplewhite and Sheraton. These names came to stand for certain styles, largely because each wrote or had books written about his work. Many other men, mostly unknown, contributed to the perfection of the styles now known by these names. More than that, there is plenty of overlapping in their own work, and more of it by other cabinetmakers who tried all kinds of experiments just as they do today. So take it easy. Judge furniture for what it really is and do not be misled by inaccurate uses of period or style names.

Queen Anne furniture is characterized by lighter construction and more graceful form than the furniture that preceded it. The cabriole leg and Dutch foot were introduced from Holland. Variations in the fiddle shaped splat became common in chairs.

***EARLY GEORGIAN
1720-1740**



Mahogany armchair—early Georgian, sometimes called "Decorated Queen Anne." A typical example of the transition style between Queen Anne and Chippendale

No great names of this era come down to us as master cabinetmakers. Wall furniture was mostly inspired by the classical designs of such architects as Kent, Wren and Chambers. The masterpiece of this period was Houghton Hall, home of Robert Walpole, premier of England, in which Kent used whole cargoes of Mahogany for woodwork and furniture. The earlier Mahogany pieces of this period were in fact still typically Queen Anne, exhibiting the simple Queen Anne lines of cabriole leg and club foot with little effort to decorate with carving. Hence, fur-

niture of Queen Anne design is authentic as well as extremely beautiful in Mahogany.

The first effect of the use of Mahogany was a tendency to lighten structural elements of furniture. Specially tempered tools were manufactured to work Mahogany, and its strength makes its use in smaller sections practical. Thus, legs of tables and chairs curved to a delicate cabriole did not require the bracing of stretchers. As Charles O. Cornelius, Curator, Metropolitan Museum, so well stated the case, "All of the skill and enthusiasm of the English craftsman seem to have been called forth by the qualities which he found in the new wood. Certainly a great part of the cabinetmaker's success in middle 18th century England is due to the inspiration which comes from handling a material perfectly related to its purpose."

This period saw the development of carved decoration: the shell, the acanthus, "C" scrolls and bird and animal claw and ball feet. Social usage, particularly tea-drinking, called forth all kinds of tables and put a premium on tables, such as the tilt-top, that could be put aside until required, and side chairs that could be drawn up closely. In chairs, the Dutch foot became the claw and ball foot.

* R. W. Symonds in "Old English Furniture," designates this the "Early Mahogany Period."



Mahogany Chippendale chair made from the oldest Mahogany in the world. The large beam from which the wood came was seasoned for over 400 years in a Santo Domingo house

THOMAS CHIPPENDALE

1718-1779

The Second of Three Generations of
Thomas Chippendales

Beyond doubt the leading fashionable cabinetmaker of London from 1750 to 1775 was Thomas Chippendale. He first published "The Gentleman and Cabinet-Maker's Director" in 1754; thus, his name has long stood for his period although there were many other cabinetmakers of his time who did quite as excellent work. Most of his furniture was made of Mahogany. The finest examples of the Chippendale style may rank as the peers of any of the great furniture of the

world. They are soundly yet spiritedly designed. Their joinery is perfection and the carving is crisp and exquisite. Their chief glory is the color and texture which have a depth and richness unexcelled.

Chippendale developed four variations of style: a development and refinement of the Queen Anne, Gothic, Chinese and French motifs. Flowing curves characterize his first styles, today judged artistically the finest he developed.

Chippendale's early work was the improvement of the decorated Queen Anne. In chairs, the fiddle-shaped splat became the delicate ribbon back; and the cabriole leg and Dutch foot became the claw and ball, which was replaced by the straight Marlborough leg by the time he published his books.

From Chippendale's accounts that have been preserved we have the following:

NOSTELL PRIORY

June 30, 1767 — To a large Mahogany library table of very fine wood with doors on each side of the bottom part and drawers within, carved and ornamented and the whole compleatly finished in the most elegant taste. £72. 10. 0

The Chippendale

ROBERT ADAM

1728-1792



Adam Mahogany chair, Lenygon collection

Adam, influenced by delicately scaled work then recently discovered at Pompeii and Herculaneum, returned from his travels in 1762 and soon established himself as an arbiter of architectural and decorative taste. His work included not only buildings, but every detail of furnishing and decoration. Much Mahogany was used in executing his designs. He usually employed vertical lines for his chair and table supports. In Mahogany, carving remained the chief decorative method. The ornament was derived from classic sources, chiefly architectural, fluting and garlands being typical. Adam styles made little impression on America as they were in vogue during the Revolution. Adam was an architect and designer, and employed cabinetmakers such as Chippendale and Hepplewhite to make the furniture.

Robert Adam had three brothers associated with him, of whom James was the best known, hence the term, "Brothers Adam."



Robert Adam often favored three-piece sideboards

GEORGE HEPPLEWHITE

1720-1786



Mahogany shield-back chair. The best known of Hepplewhite's many designs

Hepplewhite was a practical cabinet-maker and designer who first created strictly in the Adam mode. Later he developed in his own way the treatment of the shield-back chair. He originated designs for a sideboard evolved from Adam's three-piece arrangement of side table and two pedestals. The use of light-toned wood developed at this time, due to changing taste; so Hepplewhite used light-toned Mahogany to create a more subtle contrast for inlays used on

his sideboards.

Hepplewhite, being a cabinetmaker, had a love for Mahogany and its qualities of strength which permitted lighter structure. This led to many fine designs in which the wood's smooth surface of fine, brilliant grain supplied the necessary decoration. Hepplewhite is famous for his chairs and sideboards. His sideboards are most often serpentine, convex center and concave ends, with square tapered legs and spade feet, fronts inlaid in ovals. He avoided massiveness in design and reduced the size of chairs without impairing usefulness or beauty. In the Hepplewhite book, Mahogany is mentioned repeatedly although much of this work was in satinwood.

Thomas Shearer not only worked with him but contributed plates and designs for the Hepplewhite book which influenced English cabinetmaking from 1760 to 1805.

Hepplewhite's name is better known than many of his contemporaries because his wife, Alice, published the book "The Cabinetmaker and Upholsterer's Guide" two years after his death. In the days of Hepplewhite the idea of a woman in business was unthinkable. Nevertheless, it is quite likely that if the truth were known, Alice Hepplewhite had a lot to do with furniture design and even a practical knowledge of cabinetmaking. The fact that she published the book, as well as carried on the firm of A. Hepplewhite & Co. supports the theory that Alice Hepplewhite may have been the first woman master cabinet-maker.

THOMAS SHERATON
1751-1806



Mahogany chair,
Sheraton style

Sheraton's actual handiwork is unknown. He was a preacher and a pamphleteer and a business failure, who lived and died in poverty.

Sheraton did not even claim to be a cabinetmaker after he came to London in 1790, if we accept the import of the sign at his place of business in 1795:

"T. Sheraton, 106 Wardour St., Soho, teaches perspective, architecture and ornaments, makes designs for cabinetmakers, and sells all kinds of drawing books."

He published "The Cabinet Maker and Upholsterer's Drawing Book" in 1794; and his reputation was at its height at the very close of the 18th century. In general, he continued the feeling of structure and proportion developed by Adam, borrowing freely from the French designers, particularly the Louis XVI mode.

He, too, employed Mahogany and often enlivened it with inlays and borders in light woods. He was a great admirer of carving, which explains the many graceful designs that he gives for carved splats and banisters of chairs. Sheraton sideboards are typically of deep and convex ends rather than concave as with Hepplewhite. Sheraton furniture is essentially feminine in appearance but structurally strong and durable. He favored the oval, the lyre, latticework and slender urns in backs of chairs. Sheraton employed both square and turned legs, finely tapered, often with spade foot or thimble toe. His tribute to Mahogany is:

"Of all woods, Mahogany is the best suited to furniture where strength is demanded. It works up easily, has a beautiful figure and polishes so well that it is an ornament to any room in which it may be placed. Other woods, formerly used for cabinetwork, are quite laid by since the introduction of Mahogany."

T. Sheraton



Mahogany chair,
Louis XV style

**LOUIS XV
1715-1774**

Louis

The chief difference between Louis XIV (1643-1715) and Louis XV furniture is that in the former the elaborate carving and decoration are symmetrical while in the latter symmetry is avoided. Both were ornate; but Louis XV pieces are much smaller and better adapted to modern rooms. This period

is considered the most decorative style in history. The decorative theme may well be called Chinese.

An example of the use of Mahogany in this period is the purchase by Madame de Pompadour of six solid Mahogany commodes for 768 livres.



Mahogany chair,
Louis XVI style

**LOUIS XVI
1774-1793**

Louis

This period is characterized by pieces delicately scaled, smaller in structure, simple and graceful in appearance and of refined taste in ornamentation. Here, as with Adam, the influence of Italian excavations is apparent with the return to straight lines and classical decoration.

Carving to represent a twisted rope is an ever-present decoration. Fine Mahogany was often used.

Simple forms of Court furniture, principally Louis XV, were made in the Provinces. This style is now experiencing a considerable vogue under the name of French Provincial.

FRENCH EMPIRE 1804-1814



Mahogany armchair,
French Empire Style

Due to Napoleonic influence, designers turned to Greek, Roman and Egyptian schools, and made wood furniture that should have been cut from stone. The lines were stiff and ungainly in straight and angular forms with a limited use of curves. Ornament was chiefly metal or gilding. Though this style did not fit the times, it crossed to England and then to the United States where it was modified by American influence. The German expression of the Empire is known as "Biedermeier," a fanciful "honest Meier" of the newspapers of that time. These styles at their best were a contribution to furniture art. Chiefly, fine Mahogany was used. Biedermeier reproductions have never come into general use in this country but show up here and there, mostly in custom made furniture.

French Empire designs are not of a character that encourages exact reproductions in present-day furniture. The modern designer is more likely to follow the style of early American designers such as Duncan Phyfe. This practice is to take something of the form and decoration of the French Empire but to make it more beautiful and more livable through simplification. "Regency" is the name under which English furniture of the Empire influence is best known. English Regency should not be confused with French Regency which was pre-Louis XV.



Mahogany upholstered sofa in American Empire Style as best expressed by Duncan Phyfe.
The original was owned by the Washington family

COLONIAL AMERICAN

Pre-Revolutionary



Mahogany ladder-back chair, Colonial American showing Chipendale influence

In Colonial America prior to 1700 furniture was of two types. The primitive type, beginning with the first settlements, was made by local carpenters, wheelwrights or joiners, of the woods at hand, usually crude, always substantial and functional.

As the Colonies developed, however, wealthy planters of Virginia and leading citizens of the seaboard cities from Boston to Baltimore began to import fine furniture from England.

Gradually, too, the Colonies developed or received from Europe, cabinetmakers and joiners who were the equal of foreign craftsmen.

The primitive type of Colonial American furniture, to be sure, continued to be made, is being made today. But after 1700, native cabinetmakers, together with recruits from the finest workshops in England were competing with Europe. Furniture produced in this country during the 18th century not only followed the general style of that produced in England, frequently with interesting and beautiful variations, but, especially after 1750, was fully its equal. By that time the master craftsmen of Salem, Newport, New York, Philadelphia and Baltimore were making furniture that never has been surpassed.

The great cabinetmakers in America in the 18th century were workers in Mahogany. The record of the sales of American antiques proves this point. Year after year, Mahogany antiques are the most numerous and bring the record prices. Additional testimony is the close association of Mahogany with names and events that loom large in American history. Thomas Jefferson wrote the Declaration of Independence on a Mahogany desk. It was on a Mahogany desk that James Madison drafted the ideas that later became the Constitution of the United States. In Independence Hall are preserved the Mahogany furnishings used by our earliest Congress. Peter Faneuil, Paul Revere, George Washington, Alexander Hamilton, Patrick Henry — are but a few of those whose homes were made beautiful with Mahogany furniture.

FEDERAL AMERICAN

Post Revolutionary



Mahogany armchair. Reproduction of Duncan Phyfe chair presented by Lafayette to Federal Hill, where "My Old Kentucky Home" was written

The American Revolution marked to some extent the decline of the influence of Chippendale in American cabinet-making, and very definitely marked the ascendancy of the styles of Hepplewhite and Sheraton. In Philadelphia especially, the influence of Chippendale continued in chairs and highboys and lowboys until the end of the century. But by the turn of the century, Federal American styles, though typically of Hepplewhite-Sheraton origin, were shifting to modifications of the French Empire under the leadership of Duncan Phyfe. Many authorities hold that Federal American styles are among the most attractive ever produced. Certainly they are enormously popular in modern reproductions.



Mahogany furniture in Federal American style blends well with 18th Century styles



Mahogany lyre-back chair in
the style of Duncan Phyfe

DUNCAN PHYFE 1768-1854

Duncan Phyfe was the first outstanding furniture designer in America. Born in Scotland, he came with his parents to America at the age of sixteen, settling in Albany. After a time, he went into business for himself. He came to New York City in the early 1790's, received the patronage of the John Jacob Astor family, and by 1800 was the foremost furniture designer of the country.

As such, he has been credited with much unidentified furniture made by worthy contemporaries who did not use labels.

He was a public-spirited man and well known, but strangely enough no picture of him can be found today.

In Phyfe's earlier work, the Adam-Sheraton influence predominated; but this was followed by furniture that grew out of the forms of the French Directory and early Consulate. In both styles, Phyfe's furniture bears the stamp of his own unmistakable genius.

After 1830 his furniture deteriorated into what he characterized as "butcher" furniture, which, happily, was not of Mahogany.

Duncan Phyfe furniture has balance, structural integrity and economy in construction. He is most noted for his chairs and tables. His uses of the lyre, brass ferrules, Pompeiian designs and graceful outcurved legs for chairs and tables are best known. The work for which he is famous is largely in Mahogany. His name was originally Duncan Fife, but when he prospered it became: "D. Phyfe."

D Phyfe



THE BENJAMIN RANDOLPH
SAMPLE CHAIR

One of five known, made in Philadelphia (Circa 1760). Much of the fame of Randolph is based on these magnificent chairs. At the Reifsnyder sale in 1929, one of them brought \$33,000, the highest price ever paid for a chair

OTHER AMERICAN CABINETMAKERS AND DESIGNERS

During the last half of the 18th century, America had many first-class cabinetmakers whose work excelled in both design and craftsmanship. All of them worked largely in Mahogany.

The most important of these were:

ELIJAH AND JACOB SANDERSON, (1751-1825), Salem, (1757-1810). Salem's most noted cabinetmakers, shipping furniture to southern cities and to South America. They employed Samuel McIntire, Daniel Clark and

others of Salem's best designers and craftsmen.

SAMUEL MCINTIRE, (1757-1815) Salem, architect-designer and woodcarver. Drafted and cut patterns and carved chairs. His most noted work now is in the Peabody house in the Museum of Fine Arts, Boston.

JOHN GODDARD, (1723-1785) Newport, noted for his block front desks and for his careful matching of Mahogany. In his will he bequeathed his stock of Mahogany to his wife.

JOSHUA DELAPLANE, (1690-1771) New York. Substantial craftsman with prominent clientele and an early worker in Mahogany tables and cabinets.

WILLIAM SAVERY, (1721-1787) Philadelphia. Cabinetmaker. Best known of the Philadelphians and famous for his Mahogany highboys and lowboys. Much Philadelphia furniture carelessly attributed to him.

JONATHAN GOSTELOWE, (1744-1806) Philadelphia. Famed as a cabinetmaker and chairmaker, a major in the Revolutionary Army.

JOHN GILLINGHAM, (1735-1791) Philadelphia. Cabinetmaker and chairmaker, noted for Gillingham chairs with trefoil back. James Gillingham was his nephew.

THOMAS AFLECK (From Aberdeen), (1763–1795) Philadelphia.

A leader of the Philadelphia-Chippendale school. Furnished Congress Hall in Mahogany. Deported as a Tory.

BENJAMIN RANDOLPH, (1762–1792) Philadelphia. Ranks with Afleck as craftsman and businessman. Made the Reifsnnyder Chippendale Mahogany chair that sold for \$33,000.

JOHN FOLWELL, (1762–1786) Philadelphia. Cabinetmaker and designer. Has been called “The Chippendale of America.” Made the famous Speaker’s chair in Independence Hall.



REPRODUCTION OF
THE FAMOUS VAN
PELT CHIPPENDALE
MAHOGANY
HIGHBOY

Represents the climax in design and craftsmanship of the Philadelphia group of cabinetmakers (Circa 1770). This piece brought \$44,000 at the Reifsnnyder sale in 1929, an all-time record

THE NINETEENTH CENTURY



Modern reproduction
of Victorian rocker

The nineteenth century's greatest contribution to furniture was the development of woodworking machinery and the introduction of machine-made furniture. With great machines performing intricate cabinet operations with uncanny exactness and amazing speed, serviceable and beautiful furniture could be turned out at low cost and in enormous quantity.

In its beginning, however, machine-made furniture was not an unqualified benefit. Nineteenth century America was too busy building a nation to have much thought for art and beauty. At the same time, it was definitely intrigued with its own prowess with machinery. Much of the gingerbread associated with nineteenth century homes is the inevitable result of the over-enthusiasm with which we greeted the miracle of machine production.

As a result, many of the furniture styles evolved during the nineteenth century are all but forgotten, or, if remembered, are mentioned without regret. Nevertheless, this period actually saw much activity in furniture design. It witnessed the rise and fall of Victorian, Eastlake, a revival of Empire, Mission, L'Art Nouveau, English Arts and Crafts and Golden Oak. Also, a number of shops continued to turn out handmade Mahogany furniture of high quality and impeccable taste.

This furniture was mostly reproductions of 18th century styles and principally made to match other pieces. Thus some antiques are not as old as they appear to be.

Of the nineteenth century, the furniture style most familiar today is Victorian, not only because so many of us can remember homes in which it predominated but because Victorian has undergone a limited revival. The market consequently offers Victorian reproductions, especially chairs and sofas of Louis XV ancestry. Most of these pieces are of Mahogany; and because they retain the quaintness of Victorian without excess in line and decoration, they actually are more pleasing than the originals.

MODERN

One of the younger grandchildren of the Industrial Revolution is "modern" furniture. The name is unfortunate and often meaningless for there is precious little similarity between some of the designs of the 1950's and those which first broke with tradition back in the 20's.

The modern movement sprang up almost simultaneously in many countries. The Swedes, Danes, French, and Italians each sought to break with tradition at about the same time. In this country, contemporary design has received the widest acceptance in the field of architecture.

The movement was greatly stimulated by the Paris Exposition of Arts in 1925. Many things have influenced the development of old and original concepts of design. Some of these were technological, like the development of new production processes, new materials, new methods of finishing. Others were imitative. Designers of light fixtures, for instance, came to the realization that they no longer needed to make everything look like a whale oil



Mahogany's inherent warmth and beauty do much to soften the severe simplicity of Modern design

lamp or even a gas jet, they sought to create "sources" of light. As designers of appliances were freed from the restricting and cumbersome forms of castings, they slowly evolved the functional simplicities of the present day range and refrigerator.

All of these new designs had their influence on furniture; in fact many of the designers themselves came over from other fields to try their hand at working in wood and in the various categories of furniture.

Another set of influences might be characterized as social. These include reduction in size of houses and rooms, the well-nigh universality of servantless homes, and the push-button lives which modern science and ingenuity have made so characteristic.

Insofar as furniture was concerned many of the new developments were inept or grotesque. Unfortunately, some of these were multiplied by the inevitable imitators who look only to market developments with little regard for honesty of design with good taste in execution.

All during this period of groping there was a sound core that remained fine and pointed the way forward to better things. The modern designers sought less and less merely to break with the past, more and more to create pieces with good lines and form. In fact, many show early American ancestry in their simplicity and 18th Century influence in the perfection of their architectural form.

Functionalism and livability are the watchwords of contemporary design. These principles have had pronounced influence on storage furniture — itself made more important as dwelling units have become more compact, closets smaller and less numerous. Interiors of such storage units are arranged and subdivided for special purposes. Great success has been achieved in the design of units to complement one another and to fit together in space-saving arrangements.

Another modern trend is to create pieces that may serve more than one use. A desk, cupboard or a chest may become a table. A chest may serve equally well in a dining room, living room or bedroom. Cocktail tables convert into dining tables. Serving tables extend into banquet boards. Many of these tricks are, of course, not innovations as 18th Century designers often sought ingenious means of converting their pieces from one use to another.

Another item in contemporary furniture design has been the

search for, and employment of, many of the new materials and new combinations of materials. Plastics perhaps have become the most important of these new materials, and often are used with pleasing and practical effect in combination with wood. Also metals and glass are used with wood, in novel and striking forms.

In the hands of the contemporary designer, Mahogany again has proved to be one of the most versatile woods. It is available in almost every figure from simple ribbon stripe and flat cut to the most highly decorative figures, such as burl and swirl. It is also fully available in lumber form as well as in veneers. Mahogany veneer and lumber are available in large dimensions and clear cuttings, particularly effective and economical in modern design. Another major advantage, Mahogany is capable of a wide range of finishes from white to black and everything in between. The pores give a pleasing texture to finished surfaces.

Lastly, the name Mahogany has universal acceptance as the finest of cabinet woods. That is a real selling asset that pays off in the cash drawer of the manufacturer and dealer, and in years of satisfaction to the ultimate consumer.



A fine example of contemporary design in Mahogany with light finish



Mahogany cabinet, contemporary design, light finish



Mahogany, contemporary design, traditional finish

MAHOGANY ANTIQUES

One reason Mahogany has universal acceptance is its proved record as a cabinet wood. A considerable quantity of authentic 18th Century Mahogany is still in existence. Much of this early furniture is still beautiful and in excellent condition, while much of the furniture made of other woods of the same period has lost whatever beauty it had and is riddled with worm holes.

The good antiques have long since passed into the hands of collectors and museums, or are zealously guarded family heirlooms. If they are authentic, they usually sell for high prices, doubly so if the pieces have interesting historical backgrounds.

The lure of the antique is so strong and the gullibility of the seeker of bargains in "antiques" so boundless, that a segment of the market thoughtfully provides an unfailing supply of manufactured "antiques" for the uninformed enthusiast.

Unless one has a long purse and plenty of time, is experienced or is willing to pay for expert advice, it is far better to buy honest reproduction furniture.

Furniture made abroad, old or new, is always a risk as much of it goes to pieces in our steam-heated buildings.



MAHOGANY SECRETARY
Tambour Front, New England

This is a reproduction from an original in the Flayderman collection. Especially interesting is the use of crotch Mahogany for borders instead of satin-wood as used in England

OFFICE FURNITURE

Not so many years ago, the general feeling prevailed that anything was good enough for the average executive office. There were occasional fine Mahogany office suites and offices for high executives in large companies but these were the exception rather than the rule.

Today the reverse is true. Those who work in offices have come to realize that half of their waking hours are spent at the office and that they work more efficiently in pleasant surroundings. They have also learned that a well-furnished office is a valuable asset. The atmosphere created by Mahogany furniture and Mahogany woodwork with appropriate floor covering, hangings and wall covering, is one of dignity and permanence that is worthwhile in any business. In the professional office, Mahogany furniture suggests both success and discriminating taste.

The Mahogany office desk of tomorrow will be designed for greater convenience and usefulness. Features will be adjustable heights, roller bearing drawers that pull out their full length. Interior spaces will be more adaptable to special uses. Corners will be smooth and rounded. No more snagging your new nylons. Finishes will stand much more abuse than heretofore. This Mahogany office equipment will be practical as well as dignified and beautiful.



Mahogany desk and wall in modern design

PHONOGRAPHS • RADIO • TELEVISION

The early part of the century brought us the phonograph. The cylinder and horn variety soon evolved into the cabinet with everything enclosed. By the time of World War I the phonograph was an important and often an imposing cabinet in countless homes. That these phonographs were largely Mahogany is a matter of record.

Soon after World War I, the radio appeared, developed rapidly during the '20's and came to high perfection during the '30's. At first the radio bid fair to supplant the phonograph. However, great improvements were also made in the phonograph. The result was a fine instrument that is both a radio and a phonograph in a Mahogany cabinet.

In World War II, these industries converted to war electronics and did an outstanding job in producing radar and other devices, the effectiveness of which we are only now learning. These



Mahogany television cabinet in transitional design

developments are being turned to phonographs, radios and television. The latter, an infant industry before the war, has developed to an amazing degree in the past five years. In 1950, seven and a half million sets were produced. With color just around the corner, television has a bright future.

In the past, the radio industry in most instances was too intent on making and improving what went into the cabinet to pay much attention to the cabinet itself. Advertising concerned itself with what a radio would do rather than how it looked. Little thought was given to making the cabinet a part of good home decoration. There were a few well-designed cabinets but for the most part, mass production got into a groove and each new model was much like its predecessor except to become just a little more "borax" in design.

The postwar period has brought a change in the radio cabinet. It can now be taken for granted that all radios made under competent direction will be good radios. Accordingly, the radio manufacturer and dealer are more interested in how it looks and how it will fit into the home. The evolution follows that of the automobile. At first the effort was all on increasing performance. When that was achieved in a major way, appearance and appeal



In Mahogany radio cabinets, Modern designs in lighter finishes are sharing the popularity of traditional styles

became important themes. Pride of possession was appealed to in color, comfort, design and accessories. It will be the same for television. Television has taken a leaf from the radio book and has done a job on cabinets from the start. We only listen to the radio, but the television cabinet is a focal point for all eyes. It is the stage on which the world passes in review.

Just as Mahogany is the most desirable wood for home furniture, so it is for radio and television cabinets. These cabinets will be available in enduring traditional styles and in pleasing Modern, which we hope will not degenerate into juke box architecture.



Mahogany combination phonograph and radio in conventional finish is beautifully adapted to the elegance of fine interiors in either modern or traditional settings

PIANOS AND ORGANS

The earliest record of the use of Mahogany for the prototype of the piano dates back to 1790. The instrument, called a clavecin, was manufactured in England and owned by Bach. It was in a museum in Berlin. The earliest known piano of American manufacture, made about 1790, is one by Charles Albrecht, Philadelphia, and now owned by the Pennsylvania Historical Society. About 1820 Duncan Phyfe made a case of beautifully mottled Mahogany that has been preserved.

The piano is a modern musical instrument — although some of its ancestors go back into the dim and distant past. The She, a stringed instrument, probably existed in China as early as 2650 B.C. Pythagoras, the Greek philosopher, experimented with the Monochord before 500 B.C.

Today fine pianos are available, not only in types and sizes to fit present day living conditions, but also, Mahogany sounding boards are being used with excellent results.

Fortunately today it is possible to purchase a Mahogany piano or organ in a light, graceful design with a finish that is serviceable and that reveals the rare beauty of the wood.



Mahogany has long been the traditional wood for fine pianos

ARCHITECTURAL MAHOGANY

Since the inception of the use of Mahogany as a cabinet wood, it has always been used for fine interiors. Until more recent years, most of these interiors have been largely of an English or a French mode. Size and shape of panels have been varied, and decorative cornices and pilasters have been simple or ornate; but in general, the character of wood panelling had changed little in one or two hundred years. Mahogany panelling probably has changed less than other woods because it is still possible to make solid Mahogany panels due to the length, width and clearness found in Mahogany lumber. The greatest change in Mahogany woodwork has been in the lighter and more natural finishes now employed and in flush treatments in the Modern style.

Good Mahogany trim costs more than the common woods, in which the lack of natural beauty may be hidden by heavy stains or paint. It is surprising, however, how little actual difference in cost there is between Mahogany and the less decorative and less substantial woods. Much of the cost is in labor, which may be even higher in working a less tractable wood than Mahogany.

Unfortunately, Mahogany is not always on hand at a yard or woodworking plant, so, on a special order for a small quantity, a



The Mahogany walls in the Shamrock Hotel in Houston are outstanding in their beauty



Mahogany permits today's architect great latitude of expression. In this office it achieved the desired feeling of unpretentious distinction

price may be set on Mahogany that will force the use of the wood on hand. The price of Mahogany woodwork should not be more than ten or fifteen per cent greater than for common hardwood for the same specification. This premium is inconsequential when one considers the added value in beauty and permanent satisfaction. When it comes to premises for sale or rent, experience has shown that the small extra cost of Mahogany is not an expense but an investment that pays a handsome dividend.

The way to obtain the finest in Mahogany panelling is to have the entire job manufactured, assembled and finished in a cabinet factory and then erected by the cabinetmaker. The walls should be prepared according to the cabinetmaker's specifications. This procedure insures an installation of the same perfection found in the workmanship of fine furniture.

Where funds do not permit or perfection is not required, satisfactory results can be obtained by using stock or made-to-order plywood panels with base, mouldings and cornice run from Mahogany in stock patterns. If one is contemplating a Mahogany interior, the facilities of the Mahogany Association are always available.

The advantages of Mahogany panelling are many. Just as with Mahogany furniture, Mahogany panelling lends itself to any color scheme of decoration. The rich beauty of the wood produces an atmosphere of simplicity and dignity that reflects true refinement of taste.

While any kind of wood panelling usually costs more than most other types of wall treatment, the first cost is the last cost if made of Mahogany with its marvelous ability to "stay put." Instead of fading, Mahogany grows richer with the years, giving increased satisfaction and stirring an honest pride of ownership.

Mahogany panelling is rather difficult to obtain in times of scarcity. Otherwise it is quite available. The distribution of stock Mahogany plywood panels is becoming more widespread and within the reach of almost everyone. Such panels are far better than ever before.

One of the most pleasing of informal interiors is the room panelled in random Mahogany boards, especially those with the intriguing irregularities and accidents of growth. Such panelling requires no milling, except perhaps a V groove at the joints. The finish may be a simple, open pore application of lacquer.



Modern wall treatment in figured Mahogany. Furniture of bleached Mahogany in Modern style

FIXTURES AND SHOW WINDOW BACKGROUNDS

Mahogany has long been a popular wood for bank and commercial fixtures and for show window backgrounds. There is always a tremendous amount of renovating and remodeling to do. Modernizing is the order of the day. The Victorian and Early 20th Century gingerbread decoration will have to go. Better lighting, air conditioning, better use of space, greater convenience, and attractive display must be installed.

To the architect and designer, Mahogany plywood, improved by war-learned technique, offers an ideal medium for every kind of face-lifting job. There is every pattern in Mahogany to produce effects from the austere to the ornate. In finishes, everything is available from the extreme lightness of full bleaching, through the honey tones to the traditional sherry color. No surface is so large that it cannot be given a sheer treatment in Mahogany, free from blemishes or defects.

It is obvious, of course, that Mahogany offers the same fascinating possibilities for interiors of new buildings.

Among the new and interesting treatments to which Mahogany lends itself so readily is the fluted effect exemplified by this lovely door



BOATBUILDING



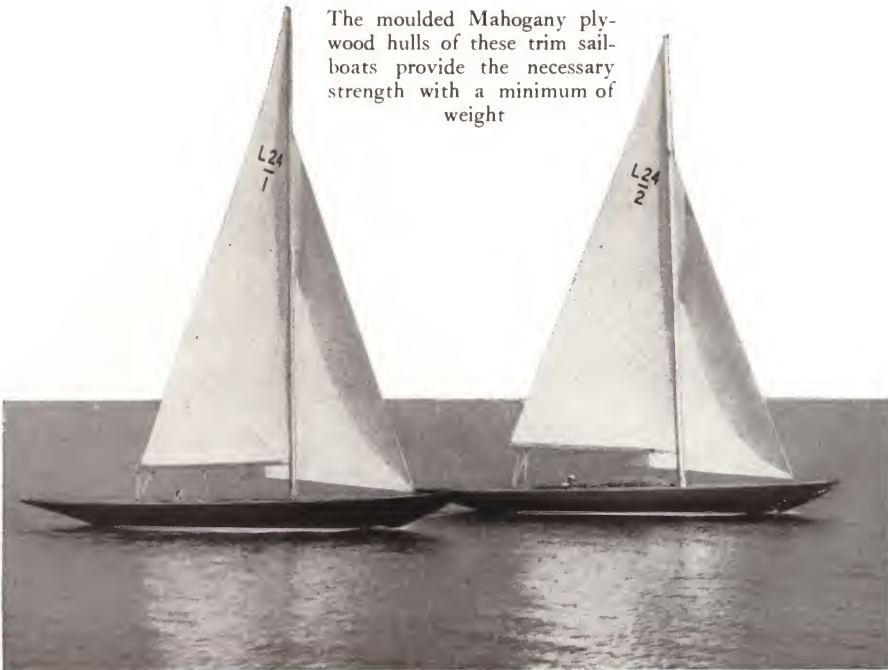
Some of the advantages of Mahogany in shipbuilding, as recorded by Edward Chaloner in 1850, were:

“Mahogany possesses the important and invaluable qualities of great buoyancy, durability, slowness to ignite, non-shrinkage, free from dry rot

and impervious to action of pernicious acids. It resists change of temperature, does not shrink or warp when subjected to excessive heat and does not expand when saturated. It works and bends easily and can be turned around difficult curves without splitting, and metal placed in contact with it does not corrode.”

After the removal of high duties on Mahogany in 1837, it became exceedingly popular in shipbuilding in England. With the advent of steel, Mahogany was relegated to interior work; but, with the coming of the internal combustion engine and the rapid increase of power cruiser vessels, the use of Mahogany in boatbuilding again expanded.

The moulded Mahogany plywood hulls of these trim sailboats provide the necessary strength with a minimum of weight





Mahogany played an important role in our famous PT fleet. Here is one of the six boats of the Torpedo Boat Squadron Three, which evacuated General MacArthur and President Quezon and which figured in W. L. White's stirring book, "They Were Expendable"



Mahogany has long been a tradition for interiors in yachts and luxury liners

MODELS AND PATTERNS

A little known but important market for Mahogany is its use in the making of models and patterns. Though one occasionally sees a beautiful scale model done in Mahogany, it is seldom that the public has a chance to inspect the precision working models and foundry patterns that skilled model and pattern makers produce in Mahogany.

Since most patterns are painted, the colors serving as a guide to the pattern maker, it is evident that Mahogany is not used for its beauty. Far from it. There are three principal reasons for its use for this purpose. It has the requisite strength. It can be worked easily with tools to exact size and smooth finish. It keeps its shape under varying moisture conditions. These are some of the same properties that make Mahogany the perfect all-round cabinet wood. Indeed, in the selection of wood for its structural merits alone, it would be difficult to find a more critical and exacting judge than the skilled pattern maker.



Mahogany pattern for instrument gauge panel. Mahogany is ideal for delicate and highly accurate patterns like these which must hold their shapes indefinitely without distortion



MISCELLANEOUS USES

We wish there were space to tell more about all the uses of Mahogany. We should like to tell you the fascinating story of the Clock, and the still unfinished story about Mahogany musical instruments and what resin-bonding may do for them. Instrument mounting and instrument cases are of Mahogany when they must be strong and keep their shapes.

Another interesting use is in parquetry flooring where Mahogany helps to create the most pleasing patterns. Mahogany is with us from the cradle to the grave, as it goes into the finest caskets. In addition to uses previously mentioned:

Aircraft
Architectural woodwork
Army Signal Corps apparatus
Baby carriages
Bar fixtures
Barometers
Bowls
Brush backs
Cameras (Studio)
Candlesticks
Caskets
Church and altar furniture
Cutlery handles and cases
Dental supply cabinets
Display fixtures
Doll furniture
Doors
Electrotype blocks
Elevator trim
Gaming equipment
Gavels

Inlay work
Ironers
Jewelry boxes
Juvenile furniture
Lamps
Looms
Medical cabinets
Miniature furniture
Models
Molded plywood boat masts
Mouldings
Music boxes
Novelties
Ornamental objects
Parquetry flooring
Pepper mills
Picture frames
Postcard vendors (automatic)
Radar equipment
Rulers and slide rules
Salad plates, forks and spoons

Salt shakers
Scientific instruments
and cases
Sewing machines
Safes in Mahogany cases
Silverware chests
Smoking equipment
Spoon racks
Sporting goods
Suitcases
Telephone equipment
Thermometers
Trailer panels
Trays
Turnings
Umbrella handles
Venetian blinds
Water skis
Wood sculpture

Wherever things are being made that add to the pleasure, convenience, and beauty of modern living . . . there you will find Mahogany — the master cabinet wood.

THE MAHOGANY MOTION PICTURES

The Mahogany Association has for many years circulated 16 mm. black-and-white silent movies to the schools and clubs throughout the country. These films, well captioned and accompanied by supplementary comment, depict the many exciting scenes in the logging and transport of Mahogany in the far-off tropics. They also show how lumber, veneer, plywood and furniture are made.

ROMANCE OF MAHOGANY (the jungle story) Silent — B&W

MAHOGANY MASTERPIECES (the furniture story) Silent — B&W

"*Mahogany — Wood of the Ages*," 16 mm. sound-color, two versions, 28½ and 43 minutes. It is a triumph in the field of visual education and entertainment. The great demand for this film makes restricted and selective bookings necessary. Application with two or more bookings in a locality — and the larger audiences will be given preferred attention.

A special printing of the 28½ minute version in black and white is also available for television broadcasting.



The film *The Romance of Mahogany* shows many action scenes deep in the heart of the jungle

WHY MAHOGANY LEADS

BEAUTY — The beauty of Mahogany is inherent in the wood itself, merely accentuated by proper finishing.

COLOR — The natural Mahogany color ranges from light pink to rich golden brown or amber. In finished form it may range from light claret to golden brown — never a dead, dull red.

WARMTH — Mahogany is famous for its inviting, cheery warmth.

HARMONY — Mahogany permits a wide range of color schemes.

DIGNITY — The dignity of Mahogany is proverbial. As a medium of good design, its distinction appeals to the discriminating taste.

VARIETY — Mahogany is the wood in which the many beautiful wood figures first became known. Mottle, fiddle-back, swirl, crotch, broken stripe and others were first used to describe Mahogany.

DURABILITY — Mahogany has a proved record for great durability.

STRENGTH — Mahogany has the necessary strength for every cabinet purpose. For delicate chair legs West Indian Mahogany has no equal among cabinet woods.

STABILITY — The unusual stability of Mahogany is proved by experience and scientific tests. In this very important characteristic it far excels competing cabinet woods.

TEXTURE — Mahogany is noted for its fine texture that permits the perfect surface, as pleasing to the hand as to the eye.

WORKABILITY — Official tests abundantly confirm the well-known fact that Mahogany is superior in taking woodworking tools.

RESALE VALUE — Good Mahogany furniture has a high resale value. One need only visit the auction room to be impressed with this fact.

UPKEEP — Here again Mahogany, properly finished, excels. It requires little attention to look its best. Natural Mahogany finishes are a joy to the housekeeper.

GENERAL SUPERIORITY — Mahogany has so many fine qualities that it is truly the measure by which other cabinet woods are judged. One wood may equal Mahogany in one characteristic and another wood in another quality; but in Mahogany are combined, to a rare degree, the many qualities desired by master craftsmen.


ACKNOWLEDGMENT

We appreciate the help and cooperation of manufacturers who make furniture that is correct in design, sound in workmanship, materials and finish. We acknowledge the aid of leading stores and decorators who believe the American home is entitled to furniture of beauty, utility and permanence. We sincerely thank the creative designers whose vision and inspiration bring us the beauty of both the traditional and modern in furniture expression. And we pay a tribute to the writers on home furnishings who day by day build an active and constructive appreciation of the fine, the beautiful and the true among their millions of readers.

INFORMATION

For additional information relative to Mahogany and Mahogany products address:

MAHOGANY ASSOCIATION
75 East Wacker Drive
Chicago (1), Illinois



*"After all there's Nothing
like Mahogany"*

MEMBERS OF MAHOGANY ASSOCIATION, INC.

IMPORTERS AND MANUFACTURERS OF MAHOGANY LUMBER AND VENEER

J. J. BONNEAU CO.

36-21 Steinway Street, Long Island City 1, New York
African and Central American Mahogany veneer and lumber

FOREIGN & DOMESTIC VENEERS, INC.

P.O. Box No. 238, Louisville 1, Kentucky
African and Central American Mahogany veneer

THE FREIBERG MAHOGANY COMPANY

Findlay & McLean Avenue, Cincinnati 14, Ohio
Tropical American and African Mahogany logs, lumber and veneer

T. HOFMANN-OLSEN EXPORT LUMBER CO., INC.

International Building, New Orleans 12, Louisiana
West Indian, Central and South American Mahogany lumber and logs

THE MENGEL COMPANY

12th & Dumesnil Avenue, Louisville 1, Kentucky
African and Central American Mahogany veneer and lumber

J. H. MONTEATH COMPANY

2500 Park Avenue, New York 51, New York
African, Central and South American Mahogany lumber and veneer

OTIS ASTORIA CORPORATION

222 Eleventh Avenue, New York 1, New York
Central and South American, Mexican and African Mahogany logs, lumber and veneer

PALMER & PARKER CO.

103 Medford Street, Charlestown District, Boston 29, Massachusetts
African, Central and South American Mahogany lumber and veneer

STEWART SMYTHE MAHOGANY CO.

Delaware River and Kirkbride Street, Bridesburg, Philadelphia 37, Pa.
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African, Central and South American Mahogany lumber and veneer

WEIS-FRICKER MAHOGANY COMPANY

P.O. Box No. 391, Pensacola, Florida
Central American and African Mahogany logs, lumber and fitches

ICHABOD T. WILLIAMS & SONS

220 Eleventh Avenue, New York 1, New York
Central and South American, Mexican, African and Cuban Mahogany logs, lumber and veneer

MAHOGANY VENEER PLATES

In 1935 the Mahogany Association, Inc. issued the first edition of THE MAHOGANY BOOK. In this book were shown pictures of Mahogany veneers in a variety of figures and patterns. The book is now in its eighth edition and from time to time other plates have been added so that they now number forty.

These plates were selected very carefully to represent types of figure but do include several that are comparatively rare. These plates have now become the accepted standards for specifying Mahogany in the veneer and plywood industry and by manufacturers using veneer or plywood products. Designers, architects and government purchasing agencies freely use the notations: "M.B.Pl. 25", etc.

Periodically the Association receives requests from buyer or seller to decide what should be a fair fulfillment of a specification based on the plates in THE MAHOGANY BOOK. The Association cannot make such rulings because this is a matter that must be agreed upon mutually by the buyer and seller. Certainly it is true that even a small amount of veneer cannot be precisely like a given plate. The veneer of no two trees is exactly alike and often two flitches from the same tree will vary considerably.

For instance, we show quartered plain stripe (Pl. 25), broken stripe (Pl. 26) and wide broken stripe (Pl. 27). These are types but there is no exact line of demarcation between them. Take the case of Plates 6, 8, 21 and 22. Plate 6 is a strong mottle figure while Plate 8 is intermediate between a broken stripe and a mottle. Plate 21 is a strong fiddle-back figure while Plate 22 is a mixture of mottle and fiddle-back. Actually there are innumerable variations and combinations that may occur between the block mottle figure and the fiddle-back figure. The point is that the plates are not to be considered as swatches of something man-made like wallpaper or fabrics.

When these plates are used in specifications they establish a close approximation as to what is desired or what is available. For instance, Mahogany has a small medullary ray that extends from the center to the circumference of the tree. When the trunk is cut on the true quarter these rays show up as little flakes. When these flakes are present it is often called "Sycamore grain" because the flakes of the sycamore tree, when quartered, show up in the same manner but are larger and much more conspicuous, and actually make the "figure" in quartered sycamore. In Mahogany, these flakes show up most frequently in the stripe figure.

It is up to the parties involved to determine what tolerances are allowable; and, it should be kept in mind that tolerance should be greater with large quantities of veneer than for small quantities.

It also should be kept in mind that the style trend today is away from rigid uniformity and toward the casual or informal. It has been said that a picture is better than a thousand words. The Mahogany plates serve a very useful purpose, but very often a few added words at the time a transaction is made will serve to make the meeting of minds more complete and to avoid a disagreement in the future.

MAHOGANY ASSOCIATION, INC.

75 E. Wacker Drive,
Chicago 1, Illinois

NEW ADDRESS:

666 N. LAKE SHORE DRIVE, Rm. 1728

CHICAGO 11, ILLINOIS

Gentlemen:

This acknowledges receipt of the eighth edition of "The Mahogany Book." Please place my name on your mailing list. I have the following comment to make on the book and on my experience with Mahogany and Mahogany products as mentioned therein:

Name

Address

City, Zone, State

Title or Position with Firm

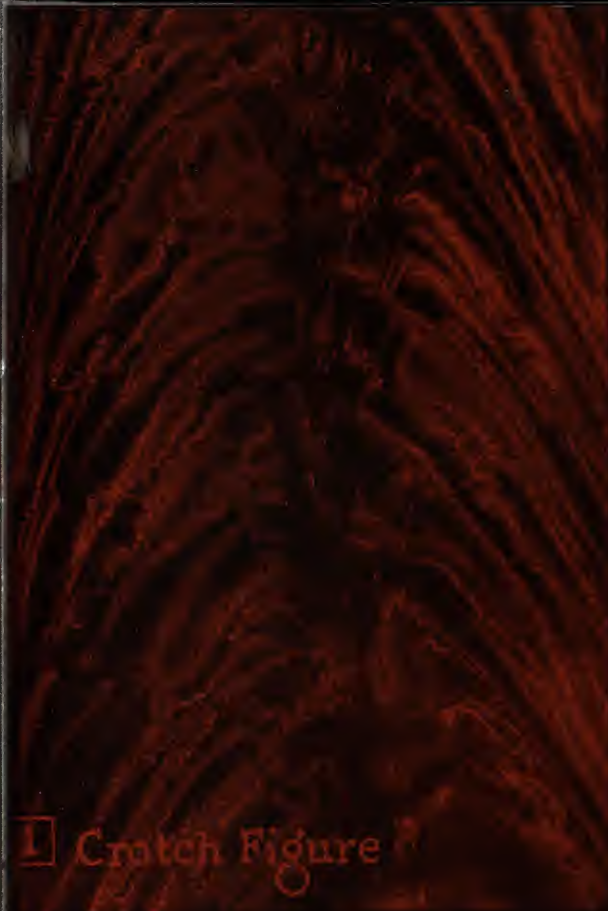
Firm

Address

Business or

Profession

Date



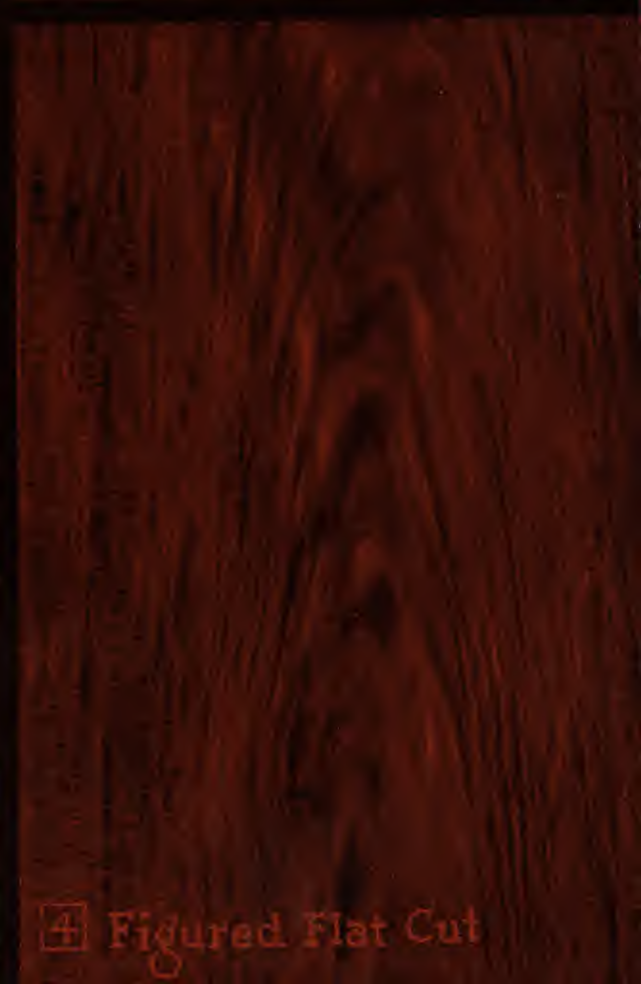
1 Crotch Figure



2 Highly Figured Swirl



3 Plain Swirl



4 Figured Flat Cut



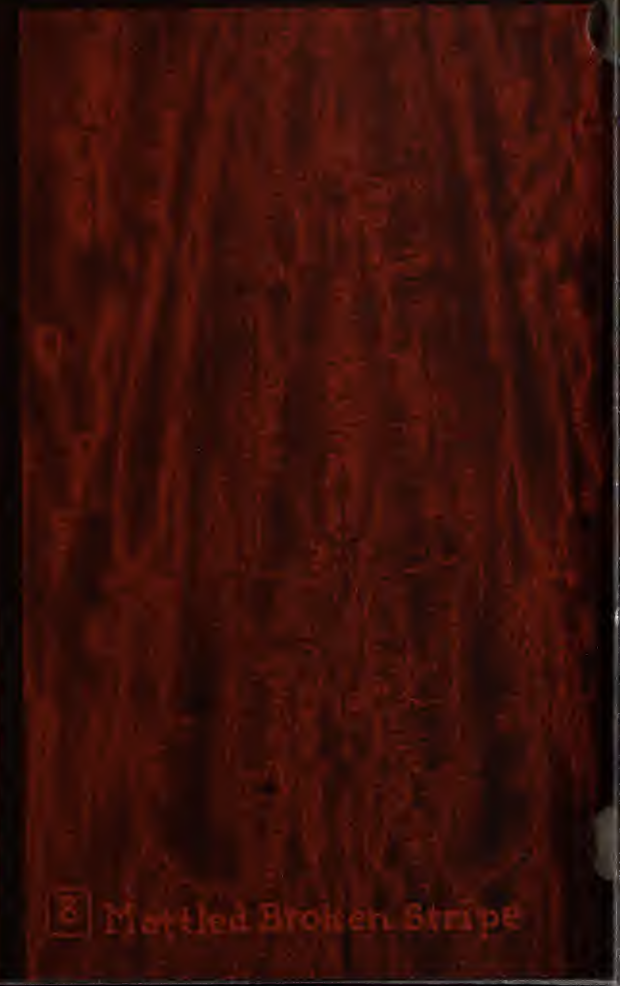
5 Fine Mottle Bee's Wing



6 Large Broken Mottle



7 Plain or Flat Cut



8 Mottled Broken Stripe

From Flat Cut to
Swirl and Crotch.

9

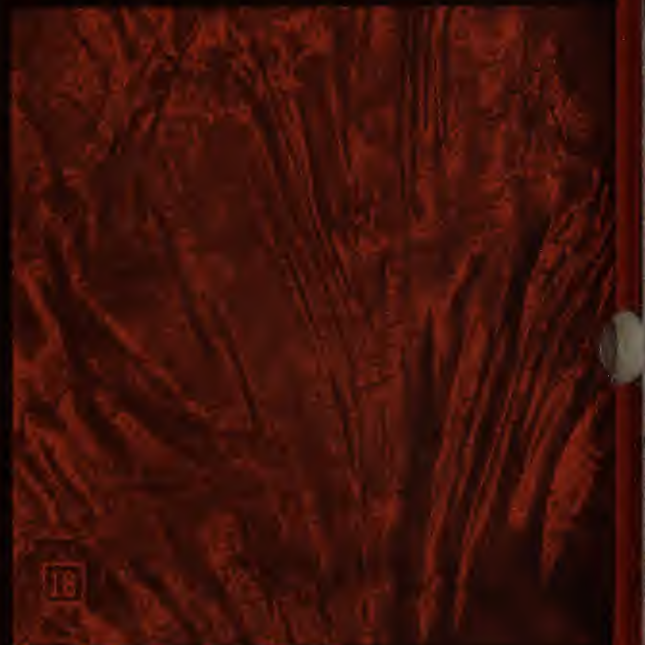
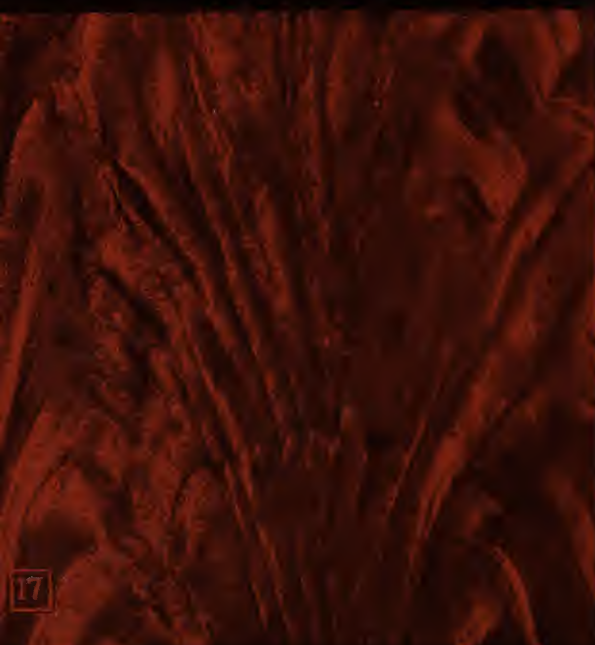
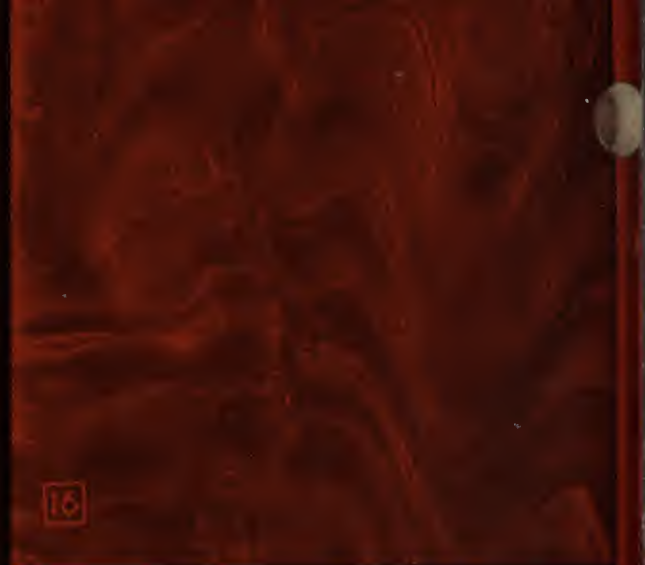
10

11

12

13

14




A dark brown leather surface with a fine, wavy, vertical ribbed texture.

21 Fiddle-back Figure

A dark brown leather surface with a complex pattern of vertical wavy lines and irregular mottled patches.

22 Mottle and Fiddleback

A dark brown leather surface with a dense, irregular, and somewhat blotchy texture.

23 Plum Pudding - Rare

A dark brown leather surface with a pattern of irregular, raised, blister-like bumps.

24 Blister Figure - Rare



25 Plain Stripe, Quartered



26 Broken Stripe



27 Wide Broken Stripe



28 Rope Figure




33 Flat Cut - *Narrow Heart - Stripy Edges*

34 Plain Flat Cut - *Narrow Heart*

35 Faux Swirl

36 Faux Swirl



[37] Fiddle-back-Flat Cut

This image shows a close-up of a wood surface with a 'Fiddle-back-Flat Cut' pattern. The grain is characterized by a series of closely spaced, slightly wavy vertical lines that create a textured, fiddle-like appearance.



[38] Mottle Swirly Figure

This image displays a wood grain pattern known as 'Mottle Swirly Figure'. It features a complex, swirling arrangement of wood fibers that create a mottled, irregular appearance with varying shades of brown.



[39] Shadow Figured Swirly

This image shows a 'Shadow Figured Swirly' wood grain pattern. The grain is characterized by a swirling, wavy arrangement of wood fibers that create a subtle, shadow-like effect with varying shades of brown.



[40] Ripple Swirly Figure

This image displays a 'Ripple Swirly Figure' wood grain pattern. It features a swirling, wavy arrangement of wood fibers that create a ripple-like effect with varying shades of brown.



31

1 piece
swirly
flat cut

32

2 piece
Matched swirly
flat cut



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